



Department of Energy
Carlsbad Field Office
P. O. Box 3090
Carlsbad, New Mexico 88221
May 23, 2022

Mr. Rick Shean, Chief
Hazardous Waste Bureau
New Mexico Environment Department
2905 Rodeo Park Drive East, Building 1
Santa Fe, NM 87508-6303

Subject: Response to the Information Request Concerning Attachment A of the 2016 Settlement Agreement and Stipulated Final Order, Item Two, Waste Isolation Pilot Plant, EPA I.D. Number NM4890139088

Reference: New Mexico Environment Department correspondence from Rick Shean, Chief, Hazardous Waste Bureau, to Reinhard Knerr, Manager, and Sean Dunagan, President and Project Manager; Subject: Request for Information Concerning Attachment A of the 2016 Settlement Agreement and Stipulated Final Order, Waste Isolation Pilot Plant, EPA I.D. Number NM4890139088, dated April 8, 2022

Dear Mr. Shean:

The purpose of this letter is to provide you with the information requested in the above-mentioned reference, Item 2. The information requested in the reference above is provided in enclosures 1 through 4. Please consider terminating the Settlement Agreement upon completing your review based on the information provided with this letter.

We certify under penalty of law that this document and all enclosures were prepared under our direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on our inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of our knowledge and belief, true, accurate, and complete. We are aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

If you have any questions, please contact Mr. Ed Garza at (575) 234-8368.

Sincerely,

Signatures on File

Reinhard Knerr
Manager
Carlsbad Field Office

Sean Dunagan
President and Project Manager
Nuclear Waste Partnership LLC

Enclosures (4)

cc: w/enclosures
R. Maestas, NMED *ED
D. Biswell, NMED ED
M. McLean, NMED ED
CBFO M&RC
*ED denotes electronic distribution

Enclosure 1

Response to April 8, 2022, Request for Information Concerning Attachment A of the 2016
Settlement Agreement and Stipulated Final Order

2 pages

Response to April 8, 2022 Request for Information Concerning Attachment A of the 2016 Settlement Agreement and Stipulated Final Order

1. *Please provide electronically the current revision for each of the following five procedures, related to Violations 11, 12, and 13 as listed in Attachment A of the SFO, by April 13, 2022*

Response: The Permittees provided the NMED with these documents on April 12, 2022.

2. *Please provide electronically responses to the below requests concerning items listed in the SFO by May 23, 2022:*

- a. *A summary table of all procedures listed in Attachment A.*

To include the following:

- *Revision dates from 2016 through the date of this letter;*
- *Current information regarding any title changes to these procedures;*
- *Current information regarding whether any of these procedures have been discontinued or combined with other procedures; and*
- *Clear documentation that any modified procedure continues to address the compliance requirements established in the 2016 SFO.*

Response: The Summary Table of Procedures in Stipulated Final Order (SFO) Attachment A is provided as Enclosure 2. This table provides the specific procedure related information requested by the NMED.

- b. *A summary table of Generator Site Technical Reviews.*

To include the following:

- *Information on GSTRs conducted between 2016 and the date of this letter;*
- *Current information on whether identified issues were resolved for each GSTR;*
- *Formal GSTR correspondences between the Permittees and generator sites such as final reports, responses to findings, and final actions; and*
- *A list of upcoming GSTRs planned for calendar years 2022 and 2023.*

Response:

Generator Site	Date of Review	Issues Resolved	Correspondence Date to Generator Site	Upcoming GSTRs
ANL	June 2018	Yes – 10/9/19	Final Report – 1/8/19 Final Closure – 11/6/19	*
INL	January 2017	Yes – 9/21/17	Final Report – 7/6/17 Final Closure – 10/6/17	*
LANL	April 2017	Yes – 4/26/18	Final Report – 3/8/18 Final Closure – 5/30/18	*
LLNL	February 2018	Yes – 5/15/19	Final Report – 11/13/18 Final Closure – 5/21/19	*

MCF/INL	November 2018	Yes – 11/21/19	Final Report – 11/4/19 Final Closure – 12/16/19	*
ORNL	September 2016	Yes – 3/9/17	Final Report – 1/13/17 Final Closure – 4/12/17	*
SRS	July 2017	Yes – 3/16/18	Final Report – 2/20/18 Final Closure – 3/28/18	*
	August 2021	Resolution in progress	Final Report – 4/20/22	

*The DOE plans to conduct GSTRs, but they have not yet been scheduled

c. The current Interface Agreements

Response: The current Interface Agreements are provided in Enclosure 3, in the following order:

- Argonne National Laboratory (ANL)
- Los Alamos National Laboratory-Carlsbad Office (LANL-CO)
- Los Alamos National Laboratory Newport News Nuclear BWXT-Los Alamos (LANL N3B)
- Los Alamos National Laboratory National Nuclear Security Administration (LANL Triad)
- Lawrence Livermore National Laboratory (LLNL)
- Idaho National Laboratory (INL)
- Idaho National Laboratory, remote-handled (INL RH)
- Oak Ridge National Laboratory (ORNL)
- Sandia National Laboratory (SNL)
- Savannah River Site (SRS)
- Waste Control Specialists (WCS)

d. A status update or any other relevant information specific to SFO Paragraph 37 which states: “DOE agrees to enter into good-faith, informal discussions with NMED and NMDOT concerning the State’s ongoing and future needs to maintain roads on WIPP designated routes and how best to address those needs to maintain roads on WIPP designated routes and how best to address those needs in light of the expiration of the authorization contained in Section 16(a) of the Waste Isolation Pilot Plant Land Withdrawal Act, Pub. L. 104-201 in federal fiscal year 2012.”

Response: The DOE entered into discussion with the NMDOT concerning the State’s ongoing and future needs to maintain WIPP designated routes in 2017. These discussions were to address SFO Paragraph 33 and the \$34 million therein to fund necessary repairs of New Mexico Roads used for the transportation of DOE shipments of transuranic waste to WIPP (WIPP designate routes). The discussions went beyond the \$34 million improvements required by SFO Paragraph 33 and included an additional \$6 million priority projects, thereby satisfying SFO Paragraph 37. Please see the enclosed (Enclosure 4) 2017 e-mail and spread sheet.

Enclosure 2

Summary Table of Procedures in Stipulated Final Order (SFO) Attachment A

18 pages

Summary Table of Procedures in Stipulated Final Order (SFO) Attachment A

SFO Attachment A Violation, Count	SFO Attachment A Topic	Documentation to Provide as Evidence of Completion from SFO, Attachment A	Information Requested by the NMED (procedure revision dates, title changes, discontinued or combined with other procedures)	Procedure Compliance Status
1, 1	<i>Combustible buildup in salt haul truck.</i>	<p><i>Provide a list of preventive maintenance procedures for liquid fueled vehicles in the underground.</i></p> <p><i>Provide a work plan to complete and submit the modifications to the Permit to add WP 12-FP0060 Semi-Annual Inspection of Equipment: Automatic Fire Suppression and Fire Detection Systems to procedures in Table E-1.</i></p> <p><i>Update inspection criteria for waste handling equipment.</i></p>	<p>WP 12-FP0060 revision dates since original submittal are 5/30/16, 10/19/16, 10/19/16, 10/24/16, 2/7/17, 3/13/18, 3/27/18, 7/1/19, 10/8/19, 8/18/20, 9/9/20, 8/2/21, and 2/21/22.</p> <p>WP 12-FP0060 title has been changed to “Semi-Annual Inspection and Test of Automatic Fire Suppression for Vehicles and Equipment”</p>	<p>The actions associated with WP 12-FP0060 were completed with the submittal of a Class 1 Permit Modification Notification (PMN) to the NMED on September 30, 2015. This PMN added the inspection for automatic on-board fire suppression systems, the respective inspection criteria, and WP-12-FP0060 to the Permit. This inspection, the respective inspection criteria, and WP 12-FP0060 are in Permit Attachment E, Table E-1.</p> <p>This procedure continues to address the compliance requirements in the SFO.</p>
1, 2	<i>Conversion of the fire suppression system to manual.</i>	<p><i>Provide a copy of technical specifications for the automatic system and the Corrective Action Plan (CAP)-related schedule.</i></p> <p><i>Provide a work plan to complete and submit the modifications to the</i></p>	N/A	N/A

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		<i>Permit to revise required equipment and inspection criteria in Permit Attachment D and E</i>		
1, 3	<i>Removal of the automatic fire detection capability.</i>	<i>See the actions for Count 2.</i>	N/A	N/A
1, 4	<i>Not using fire resistant hydraulic fluid in the truck.</i>	<i>Provide a copy of ETO-U-022 (the engineering evaluation)</i>	N/A	N/A
1, 5	<i>An ineffective emergency preparedness and response program.</i>	<p><i>Records of these activities will be kept on file at the facility. Drill and exercise program will be evaluated as part of Operational Readiness Review.</i></p> <p><i>Provide the following documents:</i></p> <ul style="list-style-type: none"> • <i>WP 12-9 WIPP Emergency Management Plan.</i> • <i>WP 12-ER4920, RCRA Contingency Plan Implementation.</i> • <i>Description of the Resource Conservation and Recovery Act (RCRA) Contingency Plan training and provide number of sessions and number of personnel trained.</i> 	<p>The document number has changed from “WP 12-9” to “DOE/WIPP 17-3573”. The revision dates since the document number change are 2/14/18, 2/28/20, 8/16/21, and 4/20/22.</p> <p>WP 12-ER4920 has been incorporated into WP 12-ER4926. This procedure includes the following electronic attachments relevant to implementing the RCRA Contingency Plan: CMR Expanded Staffing Checklist, EA12ER4926-1-0, and The RCRA Contingency Plan</p>	<p>The documents requested were provided as Attachments 6-10 in the March 25, 2016 submittal to satisfy this requirement.</p> <p>These procedures continue to address the compliance requirements in the SFO.</p>

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		<ul style="list-style-type: none"> WP 12-ER4911 Underground Fire Response. WIPP Three Year Drill and Exercise Program FY 2015-2017. 	<p>Implementation Checklist, EA12ER4926-7-0. WP 12-ER4926 revision dates since original submittal are 8/1/19 and 8/25/21.</p> <p>WP 12-ER4911 revision dates since original submittal are 4/19/16, 5/30/16, 6/16/16, 10/28/16, 11/30/16, 3/16/18 8/13/2019.</p>	
1, 6	An out-of-service regulator and fans.	None identified. Improvements will be obvious by inspection.	N/A	N/A
1, 7	Inoperable mine phones.	<p>Inspection records and results are kept on file at the facility per the Permit.</p> <p>Provide example procedure (WP 05-WH1810, Underground Transuranic Mixed Waste Disposal Area Inspections) Implementing daily inspection of mine pager phones in areas where they are being used.</p> <p>Provide a work plan to complete and submit the modifications to the Permit.</p>	<p>WP 05-WH1810 revision dates since original submittal are 5/30/16, 6/19/17, 5/3/18, 7/31/18, 4/3/19, 8/15/19, 4/20/21 and 10/25/21.</p> <p>WP 04-PC3018 revision dates since original submittal are 5/17/16, 10/10/16, 10/20/16, 5/4/17 and 5/15/18.</p>	<p>WP-05-WH1810 was provided as Attachment 11 in the March 25, 2016, submittal to satisfy the requirement to "Provide example procedure (WP 05-WH1810, Underground Transuranic Mixed Waste Disposal Area Inspections) Implementing daily inspection of mine pager phones in areas where they are being used."</p> <p>WP-04-PC3018 was provided as Attachment 12 in the March 25, 2016 submittal to satisfy this requirement. The Permit Attachment E, Table E-1</p>

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		<i>Provide a work plan to complete and submit WP 04-PC3018, Quarterly Essential Plant Communication Testing.</i>		includes both monthly and annual inspections of the mine pager phones/WP 04-PC3018. These procedures continue to address the compliance requirements in the SFO.
1, 8	<i>Insufficiently rigorous equipment inspections</i>	<i>Provide a list of preventative maintenance procedures for liquid fueled vehicles on the surface.</i> <i>Provide a work plan to complete and submit the modification to the Permit.</i>	N/A	N/A
1, 9	<i>Large quantities of material staged haphazardly throughout the mine negatively impacting worker egress.</i>	<i>Describe the training related to managing combustible loading in the underground and provide:</i> <ul style="list-style-type: none"> <i>WP 12-FP3003 Combustible Loading Controls for the Waste Handling Building and Underground.</i> <i>MWO00534 Underground Entry/Exit.</i> 	WP 12-FP3003 revision dates since original submittal are 9/14/16, 12/9/16, 11/30/17 and 7/31/18. MWO00534 was replaced with WP 04-AU534, <i>Underground Access Initiation/Termination.</i>	The documents requested were provided as Attachments 15 and 16 in the March 25, 2016 submittal to satisfy this requirement. WP 04-AU354 addresses combustible loading in the underground. These procedures continue to address the compliance requirements in the SFO.

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1, 10	<i>Numerous components of the mine ventilation system being out-of-service or impaired for an extended period of time.</i>	<i>None identified. Improvements will be obvious by inspection.</i>	N/A	N/A
1, 11	<i>Impaired alarm systems.</i>	<i>Provide Action Request (AR) closure documentation.</i>	N/A	N/A
1, 12	<i>Out of service water hydrants</i>	<i>Provide AR closure documentation.</i>	N/A	N/A
2, 1	<i>The Respondents' failure to submit a written notice concerning the fire within five (5) calendar days of the time the Respondents became aware of the circumstances is a violation of Permit</i>	<i>See Violations 8 and 9.</i>	N/A	N/A
3, 1a	<i>The Accident Investigation Board (AIB) Fire Report</i>	<i>An example of live fire training is included FWT-101 Fire Watch Training. This training is required for</i>	N/A	N/A

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	<i>specified that “[t]he training and qualification of the operator was inadequate to ensure proper response to a vehicle fire.”</i>	<p><i>underground access for personnel who have not received SAF-501 Inexperience Miner Training.</i></p> <p><i>Provide FWT-101 Fire Watch Training.</i></p> <p><i>Provide a work plan to develop and submit live fire training that includes an appropriate refresher frequency.</i></p> <p><i>Provide a work plan to complete and submit the modifications to the Permit.</i></p>		
3, 1b	<i>The AIB Fire Report discussed examples of inadequate training for the proper response to a vehicle fire: workers were unable to don personal protective equipment.</i>	<i>Provide description of revised training and summarize number of times the training has been provided and number of personnel trained in the last 12 months.</i>	N/A	N/A
3, 1c	<i>Fully integrated emergency exercises</i>	<p><i>Provide the following documents:</i></p> <ul style="list-style-type: none"> <i>12-9, WIPP Emergency Management Plan</i> 	The document number has changed from “WP 12-9” to “DOE/WIPP 17-3573”. The revision dates since the	The documents requested were provided as Attachments 6, 10, 28,

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	<i>had not been conducted.</i>	<ul style="list-style-type: none"> • 12-ER.12, WIPP Abnormal Condition Drill Program (New). • 12-ER.13, WIPP Drills and Exercises (New). • 12-ER3006, Abnormal Condition Drills (New). • WIPP Three Year Drill and Exercise Program FY 2015 – 2017. 	<p>document number change are 2/14/18, 2/28/20, 8/16/21, and 4/20/22.</p> <p>12-ER.12 has been superseded by WP 04-AD.24, WIPP Operations Drill Program. The revision dates since this was superseded are 1/2/20 and 7/29/21.</p> <p>12-ER.13 revision dates since original submittal are 8/28/19, 1/16/20, 11/8/21, 2/15/22, and 4/5/22.</p> <p>12-ER3006 has been superseded by WP 04-AD.24, WIPP Operations Drill Program. The revision dates since this was superseded are 1/2/20 and 7/29/21.</p>	<p>29, and 30 in the March 25, 2016 submittal to satisfy this requirement.</p> <p>These procedures continue to address the compliance requirements in the SFO.</p>
3, 1d	<i>Individuals identified as coordinating the Facility's response to fires had not received Incident Command System training.</i>	<p><i>Provide the following documents:</i></p> <ul style="list-style-type: none"> • 12-9, WIPP Emergency Management Plan, Support Annex I – Incident Command System. 	The document number has changed from "WP 12-9" to "DOE/WIPP 17-3573". The revision dates since the document number change are	The documents requested were provided as Attachments 6, 31, and 32 in the March 25, 2016 submittal to satisfy this requirement.

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		<ul style="list-style-type: none"> 12-ER4922, Incident Command System (New). 12-ER4923, Emergency Operations Center Personnel Selection and Qualification (New). 	<p>2/14/18, 2/28/20, 8/16/21, and 4/20/22.</p> <p>12-ER4922 revision dates since original submittal are 7/26/18, 8/26/19, 6/1/20, and 3/22/21.</p> <p>12-ER4923 revision dates since original submittal are 6/15/16, 3/16/17, 7/22/19, 5/13/20, and 12/21/20.</p>	These procedures continue to address the compliance requirements in the SFO.
3, 1e	The individual operating the salt haul truck has not received hands-on training in the use of portable fire extinguishers.	<p>An example of live fire training is included in FWT-101 Fire Watch Training. This training is required for underground access for personnel who have not received SAF-501 Inexperienced Miner Training.</p> <p>Provide FWT-101 Fire Watch Training.</p> <p>Provide a work plan to develop and submit live fire training that includes an appropriate refresher frequency.</p>	N/A	N/A

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		<i>Provide a work plan to complete and submit the modifications to the Permit.</i>		
3, 1f	<i>The AIB Fire Report concluded that Facility personnel did not fully follow the procedures for response to a fire in the underground due in part to “the lack of effective drills and training.”</i>	<i>Provide the following documents:</i> <ul style="list-style-type: none"> • 12-ER.12, WIPP Abnormal Condition Drill Program (New). • 12-ER.13, WIPP Drills and Exercises (New). • 12-ER3006, Abnormal Condition Drills (New). • WIPP Three Year Drill and Exercise Program FY 2015 – 2017. 	<p>12-ER.12 has been superseded by WP 04-AD.24, WIPP Operations Drill Program. The revision dates since this was superseded are 1/2/20 and 7/29/21.</p> <p>12-ER.13 revision dates since original submittal are 8/28/19, 1/16/20, 11/8/21, 2/15/22, and 4/5/22.</p> <p>12-ER3006 has been superseded by WP 04-AD.24, WIPP Operations Drill Program. The revision dates since this was superseded are 1/2/20 and 7/29/21.</p>	<p>The documents requested were provided as Attachments 6, 31, and 32 in the March 25, 2016 submittal to satisfy this requirement.</p> <p>This item was completed and continues to address the SFO because these documents, either as listed in the SFO Attachment A, or as incorporated into other documents are maintained on file at the facility. Drills are schedule annually pursuant to WP 12-ER.13, <i>WIPP Drills and Exercises</i>.</p>
3, 1g	<i>Facility personnel involved in the management of TRU mixed and hazardous waste were not</i>	<i>Training records and results are kept on file at the facility per the Permit.</i> <i>Refer to 3 year drill schedule (see Violation 3, Count 1c)</i>	N/A	N/A

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	<i>trained in procedures relevant to the position in which they were employed and in a manner to perform their duties in a way that ensured the Facility's compliance.</i>			
4, 1	<i>Underground PA System.</i>	<i>Provide March 4, 2015 map of the location of Permit required equipment.</i>	N/A	N/A
4, 2	<i>Evacuation Alarms.</i>	<i>Provide March 4, 2015 map of the location of Permit required equipment.</i>	N/A	N/A
4, 3-14	<i>12 Mine Pager Phones</i>	<p><i>Inspection records and results are kept on file at the facility per the Permit.</i></p> <p><i>Provide example procedure (WP 05-WH1810, Underground Transuranic Mixed Waste Disposal Area Inspections) implementing daily inspections of mine pager phones in areas where they are being used.</i></p>	<p>WP 05-WH1810 revision dates since original submittal are 5/30/16, 6/19/17, 5/3/18, 7/31/18, 4/3/19, 8/15/19, 4/20/21 and 10/25/21.</p> <p>WP 04-PC3018 revision dates since original submittal are 5/17/16, 10/10/16, 10/20/16, 5/4/17 and 5/15/18.</p>	<p>Inspection records and results are kept on file at the facility pursuant to the Permit.</p> <p>WP-05-WH1810 was provided as Attachment 11 in the March 25, 2016, submittal to satisfy the requirement to "Provide example procedure (WP 05-WH1810, Underground Transuranic Mixed Waste Disposal Area Inspections) Implementing daily inspection of</p>

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		<p><i>Provide a work plan to complete and submit the modification to the Permit.</i></p> <p><i>Provide a work plan to complete and submit WP 04-PC3018, Quarterly Essential Plant Communication Testing.</i></p>		<p><i>mine pager phones in areas where they are being used.”</i></p> <p>This action was completed with the submittal of a Class 1 PMN to the NMED on September 30, 2015. WP 04-PC3018 was provided as Attachment 12 in the March 25, 2016 submittal to satisfy this requirement. Permit Attachment E, Table E-1 includes both monthly and annual inspections of the mine pager phones. This item was completed and continues to address the SFO.</p>
5, 1	<i>534-Continuous Air Monitor (CAM)-001-152 has only been operational a total of 29 days in the last 22 months.</i>	<i>None identified. Improvements will be obvious by inspection.</i>	N/A	N/A
5, 2-4	<i>Fire panels impaired.</i>	<i>None identified. Improvements will be obvious by inspection.</i>	N/A	N/A
5, 5-9	<i>Three fire hydrants and two Post Indicator Valves (PIV)</i>	<i>None identified. Improvements will be obvious by inspection.</i>	N/A	N/A

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	<i>were either impaired or out of service.</i>	<i>Provide AR closure documentation.</i>		
5, 10	<i>A pull station was impaired.</i>	<i>None identified. Improvements will be obvious by inspection.</i> <i>Provide AR closure documentation.</i>	N/A	N/A
5, 11-43	<i>33 Emergency Lights.</i>	<i>Records of these activities will be kept on file at the facility.</i> <i>Provide AR closure documentation.</i>	N/A	N/A
6, 1	<i>Failure to implement the Contingency Plan.</i>	<i>Provide the following document: Procedure WP 12-ER4920, RCRA Contingency Plan Implementation</i>	WP 12-ER4920 has been incorporated into WP 12-ER4926. This procedure includes the following electronic attachments relevant to implementing the RCRA Contingency Plan: CMR Expanded Staffing Checklist, EA12ER4926-1-0, and The RCRA Contingency Plan Implementation Checklist, EA12ER4926-7-0. WP 12-ER4926 revision dates since original submittal are 8/1/19 and 8/25/21.	This procedure continues to address the compliance requirements in the SFO.

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7, 1	<i>Continuous air monitors.</i>	<i>None identified. Improvements will be obvious by inspection.</i>	N/A	N/A
7, 2	<i>Ventilation dampers.</i>	<i>None. Provide a work plan to complete and submit the modifications to the Permit.</i>	N/A	N/A
7, 3a	<i>Fans.</i>	<i>None.</i>	N/A	N/A
7, 3b	<i>Fans.</i>	<i>Permit required inspections will be reported in the report required by the May 12, 2014 NMED Administrative Order.</i>	N/A	N/A
7, 4a	<i>Sensors.</i>	<i>None. Improvements will be obvious by inspection.</i>	N/A	N/A
7, 4b	<i>Sensors.</i>	<i>None. Improvements will be obvious by inspection.</i>	N/A	N/A
7, 5a	<i>Primary system status display.</i>	<i>None. Improvements will be obvious by inspection.</i>	N/A	N/A
7, 5b	<i>Primary system status display.</i>	<i>None. Improvements will be obvious by inspection.</i>	N/A	N/A

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7, 5c	<i>Primary system status display.</i>	<i>None. Improvements will be obvious by inspection.</i>	N/A	N/A
8, 1	<i>24-hour notification for the release event.</i>	<i>Provide the following document:</i> <i>WP 02-PC-3005 Permit Reporting 24-Hour, 5-Day Follow-Up, Other noncompliances.</i>	WP 02-PC-3005 revision dates since original submittal are 10/19/16 and 9/10/19. The title was also changed to "Hazardous Waste Facility Permit Notification and Reporting".	This procedure continues to address the compliance requirements in the SFO.
9, 1	<i>5-day report for the release event.</i>	<i>Provide the following document:</i> <i>WP 02-PC-3005 Permit Reporting 24-Hour, 5-Day Follow-Up, Other noncompliances.</i>	WP 02-PC-3005 revision dates since original submittal are 10/19/16 and 9/10/19. The title was also changed to "Hazardous Waste Facility Permit Notification and Reporting".	This procedure continues to address the compliance requirements in the SFO.
10, 1	<i>Contingency Plan Implementation.</i>	<i>Provide the revised RCRA Contingency Plan implementing procedures:</i> <ul style="list-style-type: none"> <i>WP 12-ER4911 Underground Fire Response.</i> <i>WP 12-ER4925 CMR Incident Recognition and Initial Response.</i> <i>WP 12-ER4926 CMR Expanded Staffing Operations</i> 	WP 12-ER4911 revision dates since original submittal are 4/19/16, 5/30/16, 6/16/16, 10/28/16, 11/30/16, 3/16/18 8/13/2019.	<p>The procedures associated with the RCRA Contingency Plan were revised to clarify and enhance implementation. These procedures were provided as Attachments 9, 39, 40, and 7.</p> <p>The Permittees continue to conservatively invoke the RCRA</p>

SFO Attachment A Violation, Count	SFO Attachment A Topic	Documentation to Provide as Evidence of Completion from SFO, Attachment A	Information Requested by the NMED (procedure revision dates, title changes, discontinued or combined with other procedures)	Procedure Compliance Status
		<ul style="list-style-type: none"> <i>WP 12-ER4920 RCRA Contingency Plan Implementation. Provide a work plan to complete and submit the modifications to the Permit.</i> 	<p>WP 12-ER4925 revision dates since original submittal are 7/28/19 and 11/8/21.</p> <p>WP 12-ER4926 revision dates since original submittal are 8/1/19 and 8/25/21.</p> <p>WP 12-ER4920 has been incorporated into WP 12-ER4926. This procedure includes the following electronic attachments relevant to implementing the RCRA Contingency Plan: CMR Expanded Staffing Checklist, EA12ER4926-1-0, and The RCRA Contingency Plan Implementation Checklist, EA12ER4926-7-0.</p>	<p>Contingency Plan as evidenced by the recent April 9, 2022 implementation. The RCRA Contingency Plan was implemented although there was no threat to human health or the environment outside the facility.</p> <p>These procedures continue to address the compliance requirements in the SFO.</p>
11	Accepting D001 waste.	<ul style="list-style-type: none"> <i>CCP-TP-005, Rev 27 CCP Acceptable Knowledge Documentation.</i> <i>Revision to CBFO-MP-10.3 Rev 7 Audits to include expanded scope for certification/recertification audits.</i> 	<p>CCP-TP-005 revision dates since original submittal are 11/17/16, 12/21/18, 8/5/19, and 6/9/20.</p> <p>CBFO-MP-10.3 was converted to CBFO-OP-10.13, <i>Audits</i>. This</p>	<p>The procedures were provided as Attachment 42, 43 and 44 in the March 25, 2016 submittal to satisfy this requirement.</p> <p>Generator site technical reviews (GSTRs) continue to be performed</p>

SFO Attachment A Violation, Count	SFO Attachment A Topic	Documentation to Provide as Evidence of Completion from SFO, Attachment A	Information Requested by the NMED (procedure revision dates, title changes, discontinued or combined with other procedures)	Procedure Compliance Status
		<ul style="list-style-type: none"> • <i>CCP-PO-012, Rev 16, CCP/Los Alamos National Laboratory (LANL) Interface Document.</i> • <i>MP 10.10, Rev. 0 Technical Review of TRU Waste Generator Site Processes (New Procedure).</i> • <i>Carlsbad Field Office (CBFO) will provide a memorandum to the LANL Carlsbad Difficult Waste Team defining their role in support of CBFO activities.</i> <p><i>Provide a work plan to complete and submit the procedures and Interface Agreements.</i></p>	<p>procedure was last revised 3/22/22.</p> <p>CBFO-MP-10.10 was converted to DOE/WIPP-16-3564. This document was last revised 4/26/21.</p>	<p>pursuant to DOE/WIPP 16-3564. The CBFO-OP-10.13, <i>Audits</i> procedure was revised to remove the following:</p> <ul style="list-style-type: none"> • verification that a technical review of generator site process has been performed • verification that issues identified during the technical review have been resolved. <p>These verifications were removed because GSTRs are performed at a different frequency than certification audits. The DOE plans to conduct GSTRs, but they have not yet been scheduled.</p> <p>Since the GSTRs continue to be performed, these procedures continue to address the compliance requirements in the SFO.</p>
12	<i>Accepting Incompatible waste.</i>	<ul style="list-style-type: none"> • <i>CCP-TP-005, Rev 27 CCP Acceptable Knowledge Documentation.</i> 	CCP-TP-005 revision dates since original submittal are 2/29/16,	The procedures were provided as Attachment 42, 43 and 44 in the March 25, 2016 submittal to satisfy this requirement.

SFO Attachment A Violation, Count	SFO Attachment A Topic	Documentation to Provide as Evidence of Completion from SFO, Attachment A	Information Requested by the NMED (procedure revision dates, title changes, discontinued or combined with other procedures)	Procedure Compliance Status
		<ul style="list-style-type: none"> • <i>Revision to CBFO-MP-10.3 Rev 7 Audits to include expanded scope for certification/recertification audits.</i> • <i>CCP-PO-012, Rev 16, CCP/Los Alamos National Laboratory (LANL) Interface Document.</i> • <i>MP 10.10, Rev. 0 Technical Review of TRU Waste Generator Site Processes (New Procedure).</i> • <i>CBFO will provide a memorandum to the LANL Carlsbad Difficult Waste Team defining their role in support of CBFO activities.</i> <p><i>Provide a work plan to complete and submit the procedures and Interface Agreements.</i></p>	<p>11/17/16, 12/21/18, 8/5/19, and 6/9/20.</p> <p>CBFO-MP-10.3 was converted to CBFO-OP-10.13, <i>Audits</i>. This procedure was last revised 3/22/22.</p> <p>CBFO-MP-10.10 was converted to DOE/WIPP-16-3564. This document was last revised 4/26/21.</p>	<p>GSTRs continue to be performed pursuant to DOE/WIPP 16-3564. The <i>Audits</i> procedure was revised to remove the following:</p> <ul style="list-style-type: none"> • verification that a technical review of generator site process has been performed • verification that issues identified during the technical review have been resolved. <p>These verifications were removed because GSTRs are performed at a different frequency than certification audits. The DOE plans to conduct GSTRs, but they have not yet been scheduled.</p> <p>Since the GSTRs continue to be performed, these procedures continue to address the compliance requirements in the SFO.</p>
13, 1-4	Waste Stream Profile Form Review.	Issue WP 08-NT.03, Rev 16 Waste Stream Profile Form Review and Approval Program.	WP 08-NT.03 revision dates since original submittal are 9/22/16, 5/7/18, and 8/25/20.	The documentation pertaining to Waste Stream Profile Form reviews was provided as Attachments 47 and

SFO Attachment A Violation, Count	SFO Attachment A Topic	Documentation to Provide as Evidence of Completion from SFO, Attachment A	Information Requested by the NMED (procedure revision dates, title changes, discontinued or combined with other procedures)	Procedure Compliance Status
		<p><i>Issue WP 08-NT.1005, Rev. 0 RCRA Review Criteria for Waste Stream Profile Forms.</i></p> <p><i>Provide a work plan to complete and submit the procedures.</i></p>	<p>WP 08-NT.1005 revision dates since original submittal are 5/9/18 and 11/30/20.</p>	<p>48 in the March 25, 2016 submittal to satisfy this one-time requirement.</p> <p>These procedures continue to address the compliance requirements in the SFO.</p>

ENCLOSURE 3:

Interface Agreements

(456 pages)

CCP-PO-500

Revision 9

CCP/ANL Interface Document

EFFECTIVE DATE: 05/25/2021

Richard Kantrowitz

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	06/01/2006	Initial issue.
1	11/16/2006	Revised to implement the Waste Isolation Pilot Plant Hazardous Waste Facility Permit requirements resulting from the Section 311/Remote-Handled (RH) Permit Modification Request (PMR).
2	08/02/2011	Revised to incorporate remote-handled (RH) waste sampling and update actual work process.
3	10/01/2012	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes.
4	10/11/2012	Revised to address Carlsbad Field Office (CBFO) Corrective Action Request (CAR) 12-039.
5	02/11/2013	Revised to clarify roles associated with providing measuring and testing equipment (M&TE) Certificates of Calibration to Central Characterization Program (CCP).
6	06/21/2013	Revised to implement the Permit Modification Request Class 2 approved by New Mexico Environment Department (NMED) dated March 13, and add CH-TRAMPAC for shielded container shipments.
7	01/14/2016	Revised to replace CCP-QP-006, <i>CCP Corrective Action Reporting and Control</i> with WP 15-GM-1002, <i>Issues Management Processing of Waste Isolation Pilot Plan (WIPP) Forms</i> and make any editorial changes needed. Clarified roles and additional responsibility items in Sections 3.4, 3.6, 4.8, and 4.17.
8	07/09/2019	Revised to address an Observation identified during Carlsbad Field Office (CBFO) Audit A-18-17. Incorporated requirements for contact-handled (CH) waste characterization, certification, and shipment.
9	05/25/2021	Minor Change – updating title of WP 15-GM1002, <i>Issues Management Processing of WIPP Forms to Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.

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Figure 1 – Nuclear Waste Partnership 40

1.0 PURPOSE

The Central Characterization Program (CCP) is a mobile program designed to characterize, certify, and transport transuranic (TRU) waste from various U.S. Department of Energy (DOE) sites to the Waste Isolation Pilot Plant (WIPP) in New Mexico. The CCP is operated by Nuclear Waste Partnership (NWP), at the direction of the DOE Carlsbad Field Office (CBFO).

CBFO has deployed the CCP to the Argonne National Laboratory (ANL). CCP has been deployed to this site to process remote-handled (RH) and contact-handled (CH) TRU waste.

This interface document, subordinate to the upper tier agreement, defines the interfaces between the CCP and the ANL organization(s) necessary to perform this work. This document is invoked via a Statement of Work (SOW) between the Host site organization and NWP. This document is intended to clarify and expand on details contained in the upper tier SOW and program documents. It is not intended to be used in lieu of a task-specific SOW.

CCP services include compilation, reporting, and confirmation of acceptable knowledge (AK), CH waste processing support, radiological characterization (RC), visual examination (VE), real-time radiography (RTR), non-destructive assay (NDA), flammable gas analysis (FGA) RH waste sampling, data validation and verification, waste certification, WIPP Waste Information System/Waste Data System (WWIS/WDS) Data Entry, and Waste Transportation Packaging and Shipment.

In providing these services, CCP may opt to use other CBFO-certified TRU programs. CCP will accept batch data reports (BDRs) validated through the data generation level from these other certified programs and perform all project office activities in accordance with the CCP program.

These services will be performed with CCP and/or Host site equipment with appropriate DOE/CBFO-certified procedures. All services provided by CCP will comply with requirements delineated in 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); and the *Waste Isolation Pilot Plant Hazardous Waste Facility Permit* (HWFP) *Waste Analysis Plan* (WAP), including those requirements pertaining to waste disposal and transportation. This work will be performed under a DOE/CBFO-certified quality assurance (QA) program that meets requirements defined in DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (DOE/CBFO-QAPD).

The Host site may augment CCP characterization efforts as requested by CCP. Where required, all augmented services provided by the Host site shall comply with CCP-certified procedures.

The Host site has primary responsibility for assuring that requirements for safety, (including Radiological Control, Emergency Management, Industrial Safety, and Industrial Hygiene [IH]), security, Safety Basis, environmental permits, and other areas are met for CCP activities, and that CCP activities support the scheduled objectives.

The Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP Co-Permittees.

Throughout this document the Host site contractors' responsibilities are limited to the specific CCP activities being conducted within their facilities.

The CCP will certify DOE TRU waste at the ANL for disposal in accordance with the certification authority that has been granted by the DOE/CBFO.

This document addresses specific requirements for the following areas:

- Training and Qualification
- Container Management
- Deficiencies and Nonconformances
- VE
- RTR
- NDA
- RC (includes dose-to-curie methodology)
- Flammable Gas Analysis (FGA)
- RH Waste Sampling
- AK
- Chemical Compatibility support
- Data Validation and Reconciliation
- Measuring and Test Equipment (M&TE)
- Work Standards
- QA
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- Waste Certification and WWIS/WDS Data Entry
- Transportation
- Authorization Safety Basis and Configuration Management

The Host site will report conditions or concerns that have or may have safety, health, QA, security, operational, or environmental implications to the DOE Argonne Site Office (DOE/ASO). CCP shall report their similar issues to the Host site and to DOE/CBFO.

2.0 REQUIREMENTS

This document implements the applicable requirements of the following:

CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*

CCP-PO-002, *CCP Transuranic Waste Certification Plan*

CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*

CCP-PO-005, *CCP Conduct of Operations*

CCP-PO-026, *CCP Configuration Management*

CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*

CCP-QP-002, *CCP Training and Qualification Plan*

DOE/WIPP-02-3183, *CH Packaging Program Guidance*

DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan*

DOE/WIPP-02-3283, *RH Packaging Program Guidance*

DOE/WIPP-06-3345, *Waste Isolation Pilot Plan Flammable Gas Analysis*

DOE/WIPP-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document (QAPD)*

WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*

Argonne National Laboratory Radiological Safety Program Description

Argonne National Laboratory Radiation Protection Program – Implementation of 10 CFR 835 *Occupational Radiation Protection*

Argonne National Laboratory Integrated Safety Management System (ISMS)/Worker Safety and Health Program Description

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization and certification activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, NDA, RC, VE, RTR, flammable gas analysis (FGA), RH waste sampling, data validation and verification, waste certification, WWIS/WDS data entry, and transportation activities.

The Host site Contractors' responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host site/generator documents provided to CCP.

3.1 Initial Setup

3.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host Site Management Representative (SMR)/Designee, who will coordinate facility, QA, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site Safety Basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures or processes.
- [D] Mobilization of project management and staff.

3.2 Operations

3.2.1 CCP is responsible for the following activities to support operations:

- [A] Performing system start-up and calibration of characterization equipment at the Host site.
- [B] Performing safety walk-downs, management, and laboratory assessments prior to operation.

- [C] Responding to and resolving assessment and surveillance findings for CCP startup activities.
- [D] Ensuring CCP and Host site personnel are trained and qualified in accordance with the requirements specified in Section 4.1.
- [E] Successful completion of DOE/CBFO Certification Audit.
- [F] Providing drum tracking support for the drums introduced into characterization activities.
- [G] CCP, through NWP established programs, maintains the responsibility for reporting potential Price-Anderson Amendments Act (PAAA) issues resulting from the certification of TRU waste by CCP at ANL. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification of TRU waste by CCP at ANL. CCP shall allow the Host site to participate in the investigation of any waste certification event that results in an ORPS or PAAA report.
- [H] CCP shall support and participate in Host site investigations when CCP characterization activities result in a Host site initiated ORPS or PAAA report.
- [I] CCP shall maintain records in accordance with CCP-QP-008, *CCP Records Management*, and CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.

3.2.2 The Host site provides the following support for CCP activities:

- [A] Radiological controls as needed to support characterization activities, including:
 - Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide approved survey reports to the CCP Site Project Manager (SPM) as required.
 - Personnel dosimetry.

- Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation, as required.
 - Radiological Work Permits to support CCP activities, as required.
 - Bioassay sample collection, evaluation, and reports. Bioassay reports will be provided to the CCP Vendor Project Manager (VPM) within 90 days of sample collection, if applicable.
 - Radiological source controls.
 - Radiological Technicians for monitoring.
 - Responsible for secondary generated waste.
 - Personal Protective Equipment, as necessary.
 - Personnel facilities to accommodate the characterization and loading process.
- [B] Provides site-specific training, as needed, to ensure safe operations within the facility.
- [C] Provides ES&H support, as needed.
- [D] Provides Fire Protection and Emergency Management support, as needed.
- [E] Provides authorization basis oversight, including Unreviewed Safety Question (USQ) evaluations.
- [F] Provides environmental impact oversight and support, as needed.
- [G] Provides on-site sample and drum transportation.
- [H] Provides drum handling, inventory control, and storage location tracking.

- [I] Provides personnel to be trained and qualified under the CCP program as needed to support CCP activities such as AK, VE, RC, and solids sample collection.
- [J] Performs document classification reviews as required to allow the public release of documents such as the AK Summary Report.
- [K] The Host site maintains the responsibility for reporting potential PAAA issues resulting from issues with safe operation of CCP characterization activities (e.g., Technical Safety Requirements, Radiation Safety, Industrial Safety, IH, Maintenance, Lockout/Tagout, Conduct of Operations, etc.) at ANL. This includes filing any ORPS reports resulting from issues with safe operation of CCP characterization activities at ANL. The Host site shall allow CCP to participate in investigations resulting in ORPS or PAAA reports from issues with safe operation of CCP characterization activities at ANL.
- [L] The Host site will be allowed to participate in CCP investigations when a waste certification event results in a CCP initiated ORPS or PAAA report.
- [M] Provides adequate space and file storage capacity for CCP personnel to maintain records.

3.3 CCP Project Manager

- 3.3.1 Functions as CCP's primary interface and point-of-contact between CCP and the SMR/Designee for waste characterization and certification activities.
- 3.3.2 Unless otherwise assigned herein, ensures documents listed in step 4.22.3 are provided to the Host site.
- 3.3.3 Ensures sufficient characterization equipment and personnel are available to perform the required characterization activities at the Host site.
- 3.3.4 Provides status on CCP characterization operations to the SMR/Designee, as required.
- 3.3.5 Works in conjunction with SMR/Designee to establish and maintain reasonable and appropriate throughput of waste containers and establish defensible RC approach.

- 3.3.6 Ensures CCP management and CBFO are informed of safety, compliance, or production issues impacting CCP activities.
- 3.3.7 Provides status on CCP characterization operations to the Host site SMR/Designee.
- 3.3.8 Reviews required software QA per CCP-QP-022, *CCP Software Quality Assurance Plan*.
- 3.4 CCP Site Project Manager (SPM)
 - 3.4.1 Functions as CCP's primary WIPP Waste Acceptance Criteria (WAC), Remote-Handled TRU Waste Characterization Program Implementation Plan (WCPIP), and Waste Analysis Plan (WAP) Subject Matter Expert (SME) and compliance authority.
 - 3.4.2 Ensures the AK Summary Report for waste characterization by the CCP is provided to the Host Site Management Representative /Designee.
 - 3.4.3 Ensures Waste Stream Profile Forms (WSPFs) are reviewed and approved.
 - 3.4.4 Ensures that project level verification and validation of BDRs are completed.
 - 3.4.5 Provides evidence to the SMR/Designee of Performance Demonstration Program (PDP) participation and successful completion.
- 3.5 Acceptable Knowledge Expert (AKE)
 - 3.5.1 Collects, compiles reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.5.2 Ensures CCP has obtained necessary container information prior to characterization.
- 3.6 Quality Assurance (QA) Engineer
 - 3.6.1 Functions as CCP's primary interface and point-of-contact for QA matters between CCP, Host site, DOE/ASO, and DOE/CBFO.
 - 3.6.2 Validates the Nonconformance Reports (NCRs) generated by CCP personnel performing characterization activities at the Host site.

- 3.6.3 Provides copies of NCRs for information to the Host site SMR/Designee, as requested.
- 3.6.4 Ensures that nonconformances are dispositioned in a timely manner in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
- 3.6.5 Ensures receipt inspection per CCP-QP-026, *CCP Inspection Control*, of procured items and services is performed.
- 3.7 Host Site Management Representative (SMR)/Designee
 - 3.7.1 Functions as the Host site's primary interface and point-of-contact between the Host site and CCP.
 - 3.7.2 Ensures cognizant Host site and generator SMEs are identified and available as necessary to support the review of CCP documents defined in step 4.22.3.
 - 3.7.3 Coordinates, review, provides comments, and approves comment resolutions on documents. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
 - 3.7.4 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
 - 3.7.5 Ensures needed site infrastructure support, such as radiological, industrial safety and IH, is available for waste characterization.
 - 3.7.6 Ensures Host site-specific training is provided to the CCP VPM, as requested.
 - 3.7.7 Coordinates, reviews, provides comments, and approves comment resolutions on procedures listed in Section 4.22.3 for the purpose of ensuring facility safety requirements are met.
 - 3.7.8 Provides local support to CCP, including but not limited to VE, RC, and sampling personnel to support characterization operations as needed. Also provides personnel to support the CCP AK Experts (AKE) in the collection of required documents and procedures as needed.

- 3.7.9 Ensures that periodic QA surveillances of CCP operations by the Host site are conducted and reported to CCP.
- 3.7.10 Distributes the CCP documents listed in Section 4.22.3 to Host site reviewers as required by the Host site administrative controls.
- 3.7.11 Reviews and concurs in accordance with CCP-QP-010, on documents in Section 4.22.3 of this Interface Document.
- 3.7.12 Provides facilities, construction services, utilities, phone services, office services, and supplies.
- 3.8 CCP Vendor Project Manager (VPM)
 - 3.8.1 Obtains Host site management daily release/approval prior to performing CCP operations.
 - 3.8.2 Functions as CCP's primary interface and point-of-contact between CCP and the Host site SMR/Designee for characterization field operations.
 - 3.8.3 Provides pre-operation briefings when activities are being conducted.
 - 3.8.4 Ensures that in-process documents and the documents listed in Section 4.23.2 are transmitted to the CCP Site Project Office as soon as practicable in accordance with CCP-QP-008.
 - 3.8.5 Ensures applicable Material Safety Data Sheets (MSDS) are maintained and available to support operations.
 - 3.8.6 Provides oversight of field operations to ensure safe, efficient operations.
 - 3.8.7 Supervises day-to-day TRU waste characterization activities.
 - 3.8.8 Notifies the CCP SPM and the Nuclear Facility Manager of any abnormal events associated with safe operation of CCP characterization activities for reporting purposes.
 - 3.8.9 Notifies the Host site SMR/Designee of any potential ORPS or Noncompliance Tracking System-Reportable PAAA issues resulting from the certification of TRU waste by CCP at ANL.

3.9 Waste Certification Official (WCO)

3.9.1 Obtains approved WSPF for containers to be certified.

3.9.2 Validates the CCP WWIS/WDS Data Spreadsheet.

3.9.3 Certifies the data for the containers to be certified as identified on the CCP WWIS/WDS Data Spreadsheet.

3.9.4 Submits the container data from the CCP WWIS/WDS Data Spreadsheet to the WWIS/WDS Characterization and Certification Modules as applicable.

3.10 Transportation Certification Official (TCO)

3.10.1 Ensures CCP Transportation personnel are trained and qualified to perform WIPP-complaint CH and RH-TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current List of Qualified Individuals (LOQI).

3.10.2 Provides oversight of CCP Transportation personnel for payload and Overpack assembly and loading.

3.10.3 Builds payloads from certified containers and Overpacks provided by the CCP Waste Certification Official (WCO) in WWIS/WDS.

3.10.4 Certifies payloads for transportation to and disposal at WIPP.

3.10.5 Builds shipments from approval payloads in WWIS/WDS.

4.0 PROCEDURE

4.1 Training and Qualification

- 4.1.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.1.2 CCP and Host site personnel assigned to field operations must complete the Host site-specific training. The SMR will ensure the Host site-specific training documentation is sent to CCP Training.
- 4.1.3 Both the CCP training and Host site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.1.4 Administrative work, such as BDR reviews requiring no access to the characterization activities or processes at the Host site, may be completed by personnel who have not completed the required Host site-specific training. Personnel who have not completed Host site-specific training will not be allowed unescorted access to the characterization activities.
- 4.1.5 A LOQI will be monitored daily by the CCP VPM to confirm CCP personnel and Host site personnel assigned to CCP are qualified.

4.2 Employee Monitoring

- 4.2.1 CCP employees will be monitored in accordance with Host site radiation protection program and the ANL *Integrated Safety Management System (ISMS)/Worker Safety and Health Program Description*.
- 4.2.2 CCP employee health and safety will be monitored by Host site Health and Safety program in accordance with 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program the ANL ISMS/Worker Safety and Health Program Description*, and *ANL Work Planning and Control Manual*.

4.3 Container Management

- 4.3.1 The Host site is responsible for drum movement and storage.
- 4.3.2 The Host site will provide the dose rate and surface contamination information necessary to certify the container or canister for disposal.
- 4.3.3 CCP is responsible for container management throughout the CCP characterization process.
- 4.3.4 The Host site is responsible for providing documented information to the CCP SPM on any modification to a drum or canister after closure and/or AK has been approved.
- 4.3.5 The CCP SPM will review the documented information of modified drums and will notify the SMR when the drums are approved for entrance into the CCP characterization process.

4.4 Deficiencies and Nonconformances

- 4.4.1 CCP Identified Deficiencies and Nonconformances

NOTE

QA will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If CCP personnel identify a nonconformance condition associated with a waste container during the CCP characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] The Host site SMR/Designee may request any supporting documentation needed by the Host site. CCP will ensure appropriate closure of the deficiency. A copy of any CCP NCR related to DOE TRU waste at the ANL will be provided to the Host site SMR/Designee upon request.

NOTE

In some cases, ANL may perform the work required to resolve deficiencies identified in CCP NCRs and will initiate internal documentation as required by the ANL program. However, the CCP NCRs will remain open and administrative hold will remain on the affected containers until resolution of the NCR condition has been confirmed by CCP under its certified program. At that point, CCP will close the NCRs.

- [C] **IF** the deficiency or nonconformance cannot be resolved by the CCP (e.g., does not meet TRU Waste Acceptance Criteria),
THEN the specific drum will be returned with all required documentation to the Host site for disposition.
- [D] CCP personnel will immediately notify the CCP VPM of any abnormal event associated with the safe operation of CCP characterization activities. The CCP VPM will notify the CCP SPM and the Nuclear Facility Manager of the abnormal event.

4.4.2 Host site Identified Deficiencies and Nonconformances

- [A] Deficiencies or nonconformances identified by the Host site during this project that affect waste characterization or certification activities shall be promptly identified to the CCP VPM, who will initiate an NCR in accordance with the existing CCP deficiency reporting process in accordance with CCP-QP-005.

4.5 Visual Examination (VE)

- 4.5.1 CCP will conduct VE at the time of waste packaging or as required by the governing documents in accordance with CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*, or CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination* using a facility provided by the Host site.
- 4.5.2 The Host site will be responsible for all maintenance and repairs to the facility used for VE and/or repackaging operations.

4.6 Real-Time Radiography (RTR)

- 4.6.1 CCP will perform RTR in accordance with CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*, using an ANL provided unit. Containers rejected by RTR will be dispositioned consistent with the requirements of Section 4.4.
- 4.6.2 RTR operators will make notification to the Host site as necessary to comply with the Host site Safety Basis. These notifications will be made to Host site management and the VPM.
- 4.6.3 The Host site is to support the CCP VPM with the construction of RTR capability demonstration drums as required.

4.7 Filter Inspection/Filter Change Out

- 4.7.1 CCP Personnel will inspect container filters as part of container acceptance and will document whether the filter is a WIPP approved filter and provide the documentation to the CCP VPM.
- 4.7.2 If required, filter change out will be performed by Host site personnel and documentation will be provided to the CCP VPM.

4.8 Nondestructive Assay (NDA)

- 4.8.1 The Host site will provide support for CCP participation in the PDP. This support includes preparation of the test drums, delivery, and pick-up of the drums to/from the CCP NDA equipment and responsibility for PDP source control.
- 4.8.2 CCP will perform NDA using CCP-provided unit or multiple units as required. Containers rejected by NDA will be dispositioned consistent with the requirements of Section 4.4.
- 4.8.3 NDA operators will make notifications to the Host site as necessary to comply with the Host site Safety Basis. These notifications will be made to Host site management and the VPM.
- 4.8.4 CCP will provide the Host site with access to validated BDRs for disposal of Low Level Waste/Mixed Low Level Waste from the certified program.

4.9 Radiological Characterization (RC)

- 4.9.1 The Host site will provide a technical lead to support RC efforts based on the use of AK for stored RH-TRU waste.
- 4.9.2 CCP will provide qualified personnel, including Host site personnel, to perform RC activities.
- 4.9.3 The Host site will provide support for the CCP for performing calibration of RC instrumentation. This support includes delivery of surrogate drums and source control, as needed.
- 4.9.4 If the preliminary radiological results indicate an individual drum, or suite of TRU drums staged for characterization in the Host site, contains a Pu-239 fissile gram equivalent amount greater than 100 grams, the appropriate Host site Shift Supervisor and Facility Manager shall be immediately notified. The Host site operations will remove the container(s) and provide storage in a safe configuration. The CCP will provide a finalized RC analysis report to the Host site SMR/Designee within seven days.

4.10 RH Waste Sampling

- 4.10.1 CCP, with the Host site's concurrence, will prepare and approve a Sampling and Analysis Plan (SAP) per the requirements of the WCPIP or Section C1 of CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan* when sampling S3000 or S4000 waste stream.
- 4.10.2 CCP will conduct RH waste sampling with CCP qualified operators per CCP-TP-512, *CCP Remote-Handled Waste Sampling*, and the SAP.
- 4.10.3 RH waste sampling is performed with Host site facility equipment.
- 4.10.4 The Host site is responsible for the maintenance of the facility equipment used for RH waste sampling.

4.11 Flammable Gas Analysis (FGA)

- 4.11.1 FGA is for transportation only and will be performed using approved DOE/WIPP procedures by personnel trained under the CCP Qualification Program.

4.11.2 FGA operators will make notifications to the Host site as necessary to comply with the Host site Safety Basis. These notifications will be made to Host site management and the CCP VPM.

4.12 Source Control

4.12.1 CCP will provide a list of reference sources required for calibration of NDA systems used by CCP.

4.12.2 The Host site will be responsible for all reference sources. Responsibilities consist of inventory control, storage, shipment, and usage. The Host site will provide CCP the number of sources, location, isotopic distribution with activity levels, and the names of the custodian and authorized users, as required.

4.12.3 The Host site will be responsible for providing radiological control support associated with the CCP reference sources. This support consists of maintaining the radioactive materials area postings, periodic surveys and performing a semi-annual leak check on the sources as requested by CCP.

4.12.4 The Host site, as custodian of sources, will provide to CCP the necessary sources for calibration as requested. Host site personnel will load the sources into the matrix drums as requested by CCP. CCP personnel will be trained as users of the sources to the Host site procedures, as required.

4.12.5 The Host site will provide support for the CCP participation in the PDP. This support includes maintaining trained PDP coordinators, preparation of the test drums, delivery and pick-up of the drums to/from the CCP NDA equipment, and responsibility by the Host site SMR/Designee.

4.13 Acceptable Knowledge (AK)

4.13.1 CCP records personnel will maintain the auditable AK record necessary to support the AK Summary Report in accordance with the WIPP WAP and DOE/CBFO-QAPD.

4.13.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005 and/or the WCPIP.

[A] SMR will assist CCP AK personnel with AK collection.

4.13.3 CCP AK personnel and Host site/generator personnel develop an Interface Waste Management Documents List (IWMDL) that includes facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

[A] The AKE develops the new or revised IWMDL in accordance with CCP-TP-005 using the existing body of AK documentation.

[B] The SMR ensures cognizant Host site/generator personnel (CP) are assigned to review the new or revised IWMDL for accuracy and completeness and provide written comments as appropriate.

[C] The AKE and SMR resolve comments and questions.

[D] CCP posts the new revised IWMDL on the CCP secure file transfer protocol site.

NOTE

The activities of step 4.13.4 may be initiated as necessary by the AKE for existing waste streams, new waste streams, or during AK revisions/updates.

4.13.4 AK Assessments (AKA) are performed in accordance with CCP-TP-005.

[A] SPM provides SMR with the AKA results.

[B] SMR distributes results of the AKA to designated CPs for review and comment.

[C] AKE resolves comments with SMR and CPs.

[D] SMR concurs with final AKA in writing.

4.13.5 CCP submits new or revised AK Summary Reports to the SMR/Designee for review and concurrence.

[A] The SMR ensures CP review the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.

4.13.6 A Host site/generator CP attends a briefing on new or revised AK Summary Reports.

4.13.7 SMR notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to the IWMDL.

4.13.8 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AK Summary Report is needed.

4.13.9 The Host site will not provide any waste container to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repackage the container.

[A] The work document(s) provided to the AKE will contain the following information at a minimum:

- Identification (including revision) of the work document(s) used to generate the container
- Type of activity (e.g., packaging/repackaging only, remediation, treatment)
- Amount (estimated) and type (if known) of liquids
- Type and quantity (estimated) of absorbents used

- Type and quantity (estimated) of neutralization agents used
- Any unexpected conditions or reactions encountered
- General description of waste items
- Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
- Filter data including model and quantity used
- Parent container identification

4.13.10 The AKE will ensure they have obtained and reviewed the correct version of IWMDL documentation used to generate/manage a container before adding it to the AK Tracking Spread Sheet.

4.13.11 At a minimum of once per calendar quarter, SMR will review the current IWMDL and provide written assurance to the CCP SPM that the list is up to date OR provide necessary documentation to revise the list.

4.14 Data Validation and Reconciliation

4.14.1 CCP, using CCP-trained Host site personnel where applicable, will provide data generation level validated data packages for all characterization activities. CCP will provide data generation level validated data packages for VE, RTR, NDA, and RC in accordance with the approved CCP procedures governing these processes.

4.14.2 Wherever CCP has obtained the services of another CBFO-certified TRU Waste Program, that program will provide data generation level BDRs to CCP in accordance with their own programmatic documents.

4.14.3 CCP will provide project level validated data packages for RTR, NDA, RC, and VE.

4.14.4 The CCP SPM and AKE will perform data reconciliation with applicable data quality objectives (DQOs) in accordance with CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*, and/or the Characterization Reconciliation Report.

4.15 Measuring and Test Equipment (M&TE)

- 4.15.1 The CCP M&TE Custodian will provide a recall notification for CCP M&TE that requires calibration to the Host site SMR/Designee.
- 4.15.2 For Host site M&TE furnished for use in the CCP program, the Host site SMR/Designee will provide notification to the CCP M&TE Custodian when M&TE are added, deleted, found out-of-tolerance/defective, or failed calibration.
- 4.15.3 The Host site will make available National Institute of Science and Technology (NIST)-traceable calibration services for M&TE to the CCP. The Host site will maintain records on M&TE calibration in accordance with their Records Inventory and Disposition Schedule (RIDS). Copies of the Certificates of Calibration will be made available to the CCP VPM and/or CCP M&TE Custodian prior to issuing M&TE to CCP for use.
- 4.15.4 The Host site will make available national standard-traceable calibration services for gamma and neutron dose measurement instrumentation. The Host site will maintain records on calibration in accordance with their RIDS. Copies of the Certificates of Calibration will be made available to the CCP VPM and/or CCP M&TE Custodian prior to issuing the instrumentation to CCP for use.
- 4.15.5 The Host site SMR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.

4.16 Work Standards

- 4.16.1 CCP operations personnel will work under the Host site Lockout/Tagout procedure.
- 4.16.2 CCP and Host site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste characterization and certification activities. Host site procedures and work packages will be used for non-waste characterization activities (e.g., equipment repairs).
- 4.16.3 CCP operations personnel will operate in accordance with CCP-PO-005, *CCP Conduct of Operations*.
- 4.16.4 CCP operations personnel will comply with Host site procedures as they apply to established characterization areas.

- 4.16.5 CCP personnel will work under the Host site Safety Basis and work control standards, (i.e., General Employee Radiological Training). Maintenance work control activities for CCP supplied equipment will be controlled using CCP-TP-140, *CCP Equipment Maintenance*. Maintenance work control activities on Host facility-supplied equipment will be controlled using Host site work authorization procedures.
- 4.16.6 As outlined in CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, and CCP-PO-005, it is the responsibility of the CCP VPM to maintain equipment configuration and authorize equipment changes to ensure characterization systems are operated and maintained in accordance with the Host site Safety Basis. The CCP VPM will not authorize a change to any characterization system until steps 4.16.6 [A] and [B] have occurred:
- [A] The CCP Cognizant Engineer has reviewed and approved the proposed change in writing to the CCP VPM (this may be accomplished via e-mail). In addition, any proposed change to any vendor-supplied characterization system must be reviewed and approved by an appropriate vendor engineer or representative. The vendor engineer or authorized representative must provide written approval to the CCP VPM (this may be accomplished via e-mail) for the proposed change.
 - [B] The Host site SMR/Designee must concur with the proposed change in writing (this may be accomplished by e-mail) and provide a copy of the approved USQ, if it is required.
 - [C] The Host site will manage the configuration of the radiography unit in accordance with the appropriate Host site procedures. Once the system has been turned over to CCP for operation, no change to the configuration will be approved by the Host site without CCP's concurrence in writing (this may be accomplished by e-mail) from the CCP VPM.

- 4.16.7 CCP personnel will participate in the Host site bioassay program. CCP personnel involved in VE of waste will provide routine samples on for cause basis and upon project completion. All other CCP personnel will provide samples as requested under the routine/random program established by the Host site. All CCP personnel will submit the bioassay samples required to establish a baseline for activities at the Host site, if applicable.
- 4.16.8 The Host site will analyze bioassay samples provided by CCP personnel within 90 days of their receipt.
- 4.16.9 The CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.
- 4.16.10 The Host site radiological controls personnel will perform routine surveys for contamination and radiation as specified in Host site policies or procedures. The CCP SPM or CCP VPM and appropriate Host site management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied buildings or any of the CCP-operated characterization equipment contained in these buildings. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.16.11 The Host site will provide the CCP SPM or CCP VPM with the results of continuous or fixed air sample filter analysis within 21 days of the removal of the filter from the sampler head, in any monitored area routinely occupied by CCP personnel.
- 4.16.12 The Host site will provide the necessary dosimetry for CCP personnel. Dosimetry reports will be provided to the CCP SPM or CCP VPM.
- 4.16.13 CCP will provide historical information on the operation of any CCP equipment deployed at Host site for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.
- 4.17 Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS)
 - 4.17.1 CCP will prepare WSPFs for the subject Host site waste in accordance with CCP-TP-002.

- 4.17.2 CCP will transmit characterization and certification data using the WWIS/WDS and CCP Procedures CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry* or CCP-TP-530, *CCP RH TRU Waste Certification and WWIS/WDS Data Entry*.
- 4.17.3 CCP shall submit copies of WSPFs to the Host site for information before submittal to CBFO. The Host site will provide written concurrence on the basis of continued compliance with procedures and programs and CBFO certification of the CCP characterization program.
- 4.17.4 The CCP WCO will document and certify that all TRU waste payload containers meet the requirements of the WAC and submit the data to the WWIS/WDS for approval.
- 4.17.5 The CCP WCO will provide listings of drums requiring retrieval from storage for the purposes of loading into RH-TRU 72B canisters or shielded container assemblies.
- 4.17.6 CCP will begin their loading and shipping process using payload containers approved in WWIS/WDS.
- 4.18 Transportation
- 4.18.1 CCP Transportation is responsible for meeting all requirements for loading and shipping TRU waste certified by CCP as approved in WWIS/WDS.
- 4.18.2 CCP Transportation will direct ANL loading of containers into overpacks according to CCP WCO listings and will provide the CCP WCO with the necessary data to complete the process, if required.
- 4.18.3 The Host site provides and signs on behalf of DOE the Uniform Hazardous Waste Manifest, bill of lading, makes notifications as required, and required markings, labels, and placards for each TRU waste shipment.
- 4.18.4 CCP Transportation will provide technical resources, Transportation Certification Official (TCO) and qualified personnel to perform the transportation certification, preparation of the shipment, and loading of the waste for shipments.
- 4.18.5 The Host site will provide the equipment and trained personnel required to handle waste containers for payload assembly and loading operations.

4.18.6 CCP Transportation will provide documentation to the SMR certifying the waste for shipment according to CCP procedures.

4.18.7 The Host site will coordinate the shipment, including providing prerequisite surveys.

4.19 Quality Assurance (QA)

4.19.1 All work performed in the completion of this waste characterization and certification scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.

4.19.2 CCP will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.

4.19.3 The Host site will conduct audits/surveillances to assess compliance with applicable procedures.

4.20 Procurement

4.20.1 All items and services to be purchased under CCP-PO-001 will be graded by CCP in accordance with CCP-QP-001, *CCP Graded Approach*. The grading will determine whether the items and services are quality-affecting (Quality Level 1 or Quality Level 2) or non quality-affecting (Quality Level 0) for WIPP characterization, certification, and transportation.

[A] CCP will procure all quality-affecting items and services in accordance with CCP-QP-015, *CCP Procurement*. These items and services are the sole responsibility of CCP with regard to their quality integrity.

[B] Host site will procure items and services determined by the CCP grading process to be non quality-affecting for WIPP characterization, certification, and transportation. The Host site will be responsible for verification and compliance for these items and services.

[C] Items and services that are related to safe operation of the facility, and which do not affect WIPP characterization, certification, and transportation, are not required to be graded by CCP.

- [D] Receipt inspection of quality-affecting items will be performed by personnel trained and qualified to CCP-QP-002 or in accordance with WIPP Technical Training requirements.
- [E] CCP will maintain Receipt Inspection Verification Sheets (RIVS) and associated objective evidence for each shipment in accordance with CCP-QP-026.

4.21 Project Control

- 4.21.1 CCP and the Host site will provide weekly status for their respective scheduled activities.
- 4.21.2 CCP will maintain and provide the Host site with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.

4.22 Procedures

- 4.22.1 As defined in CCP-QP-010, editorial or minor changes may be made to all CCP documents except CCP-PO-001; CCP-PO-002, *CCP Transuranic Waste Certification Plan*; CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*; CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*; and CCP-QP-001 without the same level of review and approval as the original document. CCP will process any required changes in accordance with CCP-QP-010.
- 4.22.2 New Technical Operating Procedures (procedures that operate equipment) developed by CCP scheduled to be used at the Host site, shall be evaluated by the Host site SMR/Designee to determine if the procedure shall be added to the Host site review lists defined below.
- 4.22.3 The following documents, and all revisions to these documents, will be provided to the SMR for review by SMEs/CP; if the procedure is an operational procedure that CCP is not currently operating to, the SMR may waive the review until CCP operations commence on site. When CCP operations return to the site the SMR will be provided procedures listed below for review:
 - CCP AK Reports

- CCP Interface Waste Management Documents List
- CCP AK Assessments
- CCP Waste Stream Profile Forms
- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-CM-013, *CCP Transportation Flammable Gas Analysis (FGA)*
- CCP-HSP-014, *Health and Safety Program Implementation for CCP*
- CCP-PO-026, *CCP Configuration Management*
- CCP-PO-500, *CCP/ANL Interface Document*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-018, *CCP Management Assessment*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*
- CCP-TP-140, *CCP Equipment Maintenance*

- CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*
- CCP-TP-504, *CCP Dose-to-Curie Survey Procedure for Remote-Handled Transuranic Waste*
- CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*
- CCP-TP-512, *CCP Remote-Handled Waste Sampling*
- CCP-TP-513, *CCP Procedure for Dimensional or Gravimetric Measurements for Radiological Characterization of Remote-Handled Transuranic Waste*
- CCP-TP-554, *CCP Remote-Handled Grapple Pre-Operational Checks and Operation*

NOTE

Examples of cognizant personnel may include, but is limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

4.22.4 Upon receipt of a document listed in step 4.22.3 the SMR/Designee will ensure the document is reviewed by cognizant personnel responsible for the waste management activities relevant to the scope of the document.

4.22.5 As warranted, the SMR/Designee will provide written comments to CCP for inclusion in the Document Review Record in accordance with CCP-QP-010.

4.22.6 CCP, at its direction, may request objective evidence to support the competency of Host site/generator reviewers.

4.22.7 The CCP SPM will confirm that the SMR/Designee written comments are resolved prior to proceeding with CCP operations under the scope of the document being reviewed.

4.22.8 The following documents, and all revisions to these documents, will be provided to the Host site SMR/Designee as Notify Only for review:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-TP-001, *CCP Project Level Data Validation and Verification*
- CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*
- CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*

4.22.9 CCP will maintain control of procedures in accordance with CCP-QP-010.

4.22.10 The Host site SMR/Designee will review or designate the appropriate reviews of the CCP procedures listed in Section 4.22.3 and forward written comments to CCP Document Control in accordance with CCP-QP-010 for resolution.

4.22.11 The CCP SPM will confirm that the Host site SMR/Designee written comments are resolved with the Host site SMR/Designee concurrence prior to proceeding with CCP operations.

4.23 Document Transmittals

4.23.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as QA records will be transmitted in accordance with CCP-QP-008.

4.23.2 Documents to be provided to the Host site by CCP include:

- [A] List of equipment requiring calibration
- [B] Copies of NCRs and Issue Notices, as applicable
- [C] Copies of AK Summary Reports
- [D] Copies of AK source documents and source document summaries, as requested
- [E] Copies of QA surveillance reports
- [F] Copies of WSPFs
- [G] Copies of VE, RTR, NDA, and RC, information and data, as requested
- [H] Copies of RIVS and associated objective evidence for each shipment
- [I] Information on chemical usage, sources required, and copies of applicable MSDSs as requested for inventory or reporting reasons

- [J] Copies of training requirements and associated training records for CCP personnel supporting the Host site
- [K] CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- [L] CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- [M] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/Department of Environmental Quality/U.S. Environmental Protection Agency (EPA) or other regulatory audit or compliance/enforcement actions that may impact its ability to characterize and transport TRU waste
- [N] Copy of final data package to WIPP via WWIS/WDS, as requested
- [O] Documented evidence of participating in and passing the CBFO performance demonstration program, if necessary
- [P] NMED and EPA approval of the CBFO Certification Audit Report
- [Q] Documents called out in Section 4.21

4.23.3 Documents to be provided to CCP by the Host site include:

- [A] Documentation of training completion for CCP and Host facility personnel for training received from the Host site
- [B] Copies of AK source documentation requested by CCP
- [C] Radiological dose rate and surface contamination results on waste drums as needed to support WWIS/WDS data entry
- [D] Radiological information as described per Section 3.2.2[A] of this document
- [E] Copies of NCRs, deficiency reports, or other nonconformance documentation per Section 4.4
- [F] Copies of the results of Host site assessments pertaining to CCP

- [G] Copies of calibration certifications
- [H] Copies of QA surveillance reports
- [I] Radiological workplace and exposure data including As Low As Reasonably Achievable Planning documents for evaluation of activities
- [J] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to characterization activities

4.24 Authorization Safety Basis and Configuration Management

- 4.24.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved Host site documented safety analysis.
- 4.24.2 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with site procedures that protect the personnel, public, and environment.
- 4.24.3 For CCP-provided equipment, CCP will provide documentation necessary for the Host site to perform the evaluation against the safety analysis. This documentation may include health and safety plans, hazards assessments, system descriptions, equipment drawings, or other information deemed necessary by the Host site.
- 4.24.4 For Host site-provided equipment, CCP will review operational and authorization basis documentation to ensure the safety of CCP personnel while operating equipment.
- 4.24.5 All changes to equipment operated by CCP will be controlled by the Host site work-control program to ensure appropriate authorization basis evaluations are conducted and associated controls are established.
- 4.24.6 The Host site will submit all changes to authorization-basis requirements that affect CCP operations for review and concurrence prior to implementation.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP documents referenced in this plan are maintained in accordance with CCP-QP-008.
- 5.3 All QA records generated by CCP documents referenced in this plan shall be maintained by CCP.
- 5.4 All QA records generated by CCP will be maintained and dispositioned in accordance with CCP-QP-028.
- 5.5 Host site will maintain the following records in accordance with Host site requirements. The list includes, but is not limited to, the following:
 - 5.5.1 MSDS
 - 5.5.2 Calibration Certifications
 - 5.5.3 Project Control schedules and cost data reports
 - 5.5.4 Radiological records (Exposure records)

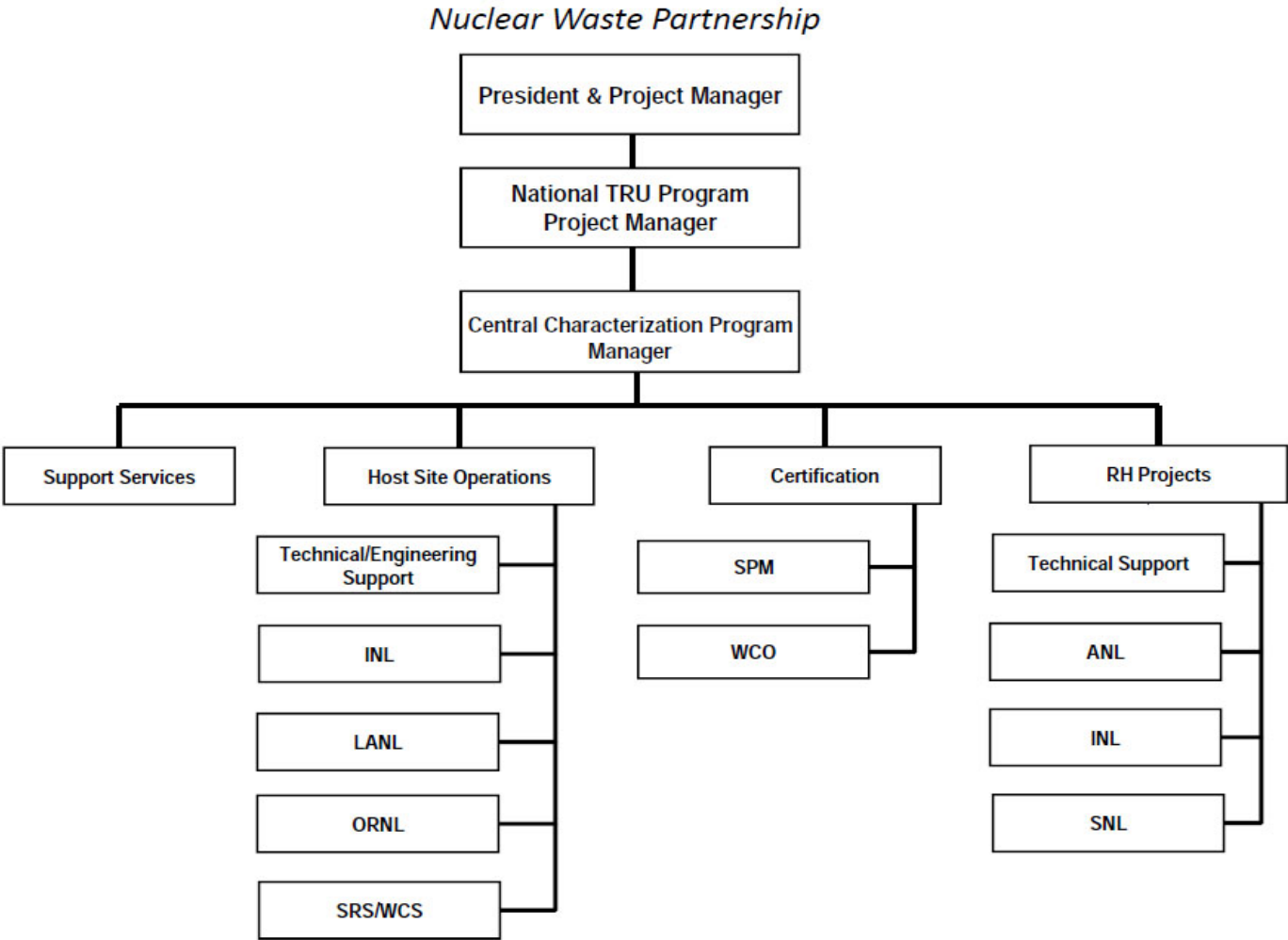
6.0 OVERSIGHT

NOTE

Through the associated SOW, the Host site has delegated the authority to characterize, certify, and ship TRU waste to the WIPP. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the WAC and WAP. However, the Host site may conduct, at their discretion, periodic surveillances of CCP operations.
- 6.2 Following successful completion of the certification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with the Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP SPM. QA and the SPM will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any finding or other deficiencies against the CCP SOW.
 - 6.3.2 If required, prepare and process Issue Notice(s) in accordance with WP 15-GM1002, *Integrated Issues Management* for deficiencies identified during the review.
 - 6.3.3 Provide Host site QA with CCP actions to correct the identified deficiencies, as documented in the CCP Issue Notice.
 - 6.3.4 QA will maintain an information file of the Host site surveillance reports conducted on the CCP SOW.

Figure 1 – Nuclear Waste Partnership



CCP-PO-015

Revision 3

CCP/LANL-CO Interface Document

for activities performed at the
Mobile Loading Storage and Staging Facility
(MLSSF)

EFFECTIVE DATE: 06/03/2020

Richard Kantrowitz

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
1	06/15/2003	Initial Revision.
2	07/16/2013	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes, and freeze file change.
3	06/03/2020	Revised to clarify errant steps for the Corrective Action Plan to address Carlsbad Field Office (CBFO) Corrective Action Report (CAR) 20-008.

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1.0 PURPOSE

This document describes the interfaces between Nuclear Waste Partnership (NWP) and Los Alamos National Laboratory-Carlsbad Office (LANL-CO) for Central Characterization Program (CCP) activities conducted at the Mobile Loading Storage and Staging Facility (MLSSF). MLSSF activities are limited to Mobile Loading equipment storage, staging, equipment preparation for transport, and some training of Mobile Loading Team members as required by the CCP training coordinator. CCP Mobile Loading team members, select CCP-NWP maintenance employees (for potential on site equipment preventive maintenance (PM) and recalibration activity), and contracted support service providers (such as crane and forklift operators) will perform work at the workspace leased to LANL-CO at the MLSSF. The purpose of this document is to clarify the roles and responsibilities of LANL-CO and NWP regarding CCP work conducted at the workspace leased to LANL-CO at the MLSSF.

1.1 Background

CCP provides waste characterization, mobile loading, and transportation certification services to transuranic (TRU) waste generator sites. The mobile loading and transportation certification services are performed by LANL-CO for CCP at the TRU Waste generator facilities. The MLSSF workspace is leased by LANL-CO for the sole purpose of providing a location for storage/staging of mobile loading equipment, and limited mobile loading team training activities. This MLSSF workspace allows LANL-CO to provide the mobile loading and transportation certification services required by the CCP in an effective and efficient manner.

1.2 Scope

This document addresses LANL-CO and NWP responsibilities associated with CCP activities conducted at the MLSSF. Relevant activities include the following:

- Transportation and Mobile Loading equipment staging/storage
- Mobile Loading Equipment Receipt and Unloading for staging/storage
- Mobile Loading Equipment Preparation/Packaging for dispatch to generator facilities for CCP support
- CCP Mobile Loading and Transportation Certification Personnel Training and Qualification

1.3 Site Information

The MLSSF is located at 907 Airport Avenue, Carlsbad, New Mexico. The facility is leased to LANL-CO. The workspace is limited to a high bay work area with access for large equipment ingress and egress and a small office area. LANL-CO has access to a large outdoor area where Mobile Loading Equipment is staged for transport to remote sites for mobile loading and transportation certification work as directed by CCP. This outdoor area is also infrequently used for mobile loading team personnel training exercises as needed to maintain the CCP required training and qualifications.

2.0 REQUIREMENTS

This document implements the applicable requirements of:

- CCP-PO-005, *CCP Conduct of Operations*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-015, *CCP Procurement*
- OST 402-130-01.2, *LANL Laboratory Occurrence Reporting Requirements/Guidance*
- LANL LIR 402-130-01.2, *Abnormal Events*
- DOE Standard 1090-2011, *Hoisting and Rigging*
- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-QP-016, *CCP Control of Measuring and Testing Equipment*
- CCP-TP-067, *CCP Forklift Preoperational Checks, Operation, and Shutdown*
- LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, and Maintenance

3.0 RESPONSIBILITIES

3.1 LANL-CO

- 3.1.1 Maintain the lease of the MLSSF (or other equivalent) workspace as needed to provide effective and efficient Mobile Loading and Transportation Certification support services as required by CCP.
- 3.1.2 Maintain the work area in the MLSSF in compliance with the requirements of the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.
- 3.1.3 Post the current copy of the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Storage, Staging, & Maintenance in a readily accessible location in the MLSSF workspace.
- 3.1.4 Ensure that the posted copy of the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Storage, Staging, & Maintenance is the most recent version.
- 3.1.5 Ensure that at least as frequently as once per year the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Storage, Staging, & Maintenance is reviewed and revised, as appropriate.
- 3.1.6 Ensure that all CCP Mobile Loading Team members working at the MLSSF read and understand the requirements of the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Storage, Staging, & Maintenance.
- 3.1.7 Procure hand tools, incidental equipment, and supplies needed to provide effective and efficient Mobile Loading and Transportation Certification support services as required by CCP.
- 3.1.8 As necessary and appropriate, ensure that LANL LIR 402-130-01.2 Abnormal Events is implemented.
- 3.1.9 Provide a Subject Matter Expert (SME) and support NWP in maintenance of the necessary CCP Mobile Loading and Transportation Certification procedures.
- 3.1.10 Oversee initial and pre-job inspections of mobile lifting equipment, and document on the applicable record forms (checklist).

3.1.11 Provide an on-site Facility Coordinator. The LANL-CO MLSSF Facility Coordinator (FC), or the designee, shall be present during all CCP work activities conducted at the MLSSF. The FC, or the designee shall:

- Lead all pre-evolution briefings and ensure that necessary documentation generated is forwarded to NWP for CCP records disposition. The FC, or the designee, will ensure that pre-evolution briefings cover all aspects and possible hazards associated with the task, and that all work is performed in a safe and compliant manner.
- Ensure the completion of equipment inspections (initial and pre-job) and conduct operator qualification verification as directed by the NWP for CCP, and ensure that necessary documentation generated is forwarded to the NWP for CCP records disposition.
- Ensure that hazard analyses that bound the MLSSF operating envelope are conducted consistent with the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.
- Ensure that all involved personnel with an active role in lifting/hoisting activities participate in applicable pre-evolution briefings.
- Ensure that any contracted lifting/hoisting and rigging equipment is inspected, as appropriate, prior to placement into service at the MLSSF.
- Through implementation of LANL Laboratory Occurrence Reporting Requirements/Guidance (OST 402-130-01.2), which is compliant with Department of Energy (DOE) Order 232.1A, *Occurrence Reporting and Processing of Operations*, ensure that any off-normal events that occur at the MLSSF are appropriately classified. The FC, or the designee, shall seek the assistance of trained and qualified Facility Representatives from the DOE Carlsbad Field Office (CBFO) and/or NWP in making these classification decisions.
- When the results of any event classification merit such action, implement the formal event reporting process per the requirements of LANL LIR 402-130-01.2, *Abnormal Events*.

- Maintain the necessary training to oversee operations of lifting/hoisting and rigging equipment occurring at the MLSSF. The training requirements shall be met by having current Forklift and Crane Operator training which meets the applicable requirements of DOE-STD 1090-2011, *Hoisting and Rigging*.

3.2 NWP

- 3.2.1 Maintain the infrastructure necessary for Mobile Loading and Transportation Certification personnel training and qualification, conduct of operations, nonconformance control, document control, measuring and test equipment (M&TE) and equipment calibration services, records management, operating procedure maintenance, and procurement of Quality Level 1 and Quality Level 2 equipment, parts, supplies, and services.
- 3.2.2 Maintain the necessary Mobile Loading and Transportation Certification operating procedures to meet the requirements of the CBFO Quality Assurance Program Document (QAPD), the Waste Isolation Pilot Plant Waste Analysis Plan (WIPP-WAP), the Waste Isolation Pilot Plant Waste Acceptance Criteria (WIPP-WAC), the Transuranic Package Transporter Model II (TRUPACT-II) Safety Analysis Report for Packaging (SARP), the HalfPACT SARP, the TRUPACT-III SARP, the remote-handled (RH)-TRU 72B SARP, and the TRUPACT-II Authorized Method for Payload Control (TRAMPAC).
- 3.2.3 Communicate relevant CCP work priorities to the FC, or the designee.
- 3.2.4 Provide for the procurement of any necessary mobile lifting and/or hoisting equipment, and any contract operators required for MLSSF and/or TRU Waste generator site work activities. Any such equipment and/or operator needs will be determined by NWP for CCP, in consultation with the FC, or the designee.

4.0 INTERFACE

4.1 Work Standards

4.1.1 Work at the MLSSF will fall under one of the following categories, and will be conducted as described below:

- [A] Direct CCP support - this work is governed by CCP procedures, and includes training activities such as payload assembly and contact-handled (CH) packaging loading. As such, the following work controls invoked by CCP procedures are applicable:
- Operating practices and procedural controls shall be in accordance with CCP-PO-005, *CCP Conduct of Operations*
 - Training of personnel shall be in accordance with CCP-QP-002, *CCP Training and Qualification Plan*
 - Deficiency reporting shall be in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
 - Records shall be maintained in accordance with CCP-QP-008, *CCP Records Management*
 - Procedures shall be prepared and controlled per CCP-QP-010, *CCP Document Preparation, Approval, and Control*
 - Components and services shall be procured in accordance with CCP-QP-015, *CCP Procurement*
 - Equipment calibrations shall be conducted in accordance with CCP-QP-016, *CCP Control of Measuring and Testing Equipment*
 - Forklift Operations will be performed by trained and qualified MLU Personnel in accordance with CCP-TP-067, *CCP Forklift Preoperational Checks, Operation, and Shutdown*

[B] Indirect CCP support - this work is performed to support routine facility operations, such as off-loading equipment deliveries, ordering facility supplies, and performing landlord functions. The FC will direct these work evolutions, and impose the appropriate level of control listed below based on his evaluation of the specific task:

- Determination of the need for a written work package will be based on the complexity and risk of the specific task
- Determination of the extent of training and qualification required for personnel
- Determination of required equipment inspections

4.1.2 For all work performed at the MLSSF, the following controls shall be applied:

[A] The FC shall direct and control all work.

[B] All personnel performing work shall read and understand the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.

[C] The FC will conduct a pre-job briefing for each task which will address the following:

Work controls

- Industrial safety & hygiene issues
- Lifting and handling evolutions
- Special precautions and limitations
- Environmental impacts
- Emergency response actions
- Material controls

[D] Emergency response to any unplanned event shall be in accordance with the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.

[E] Environmental controls shall be in accordance with the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.

- [F] Lifting and handling activities shall be controlled in accordance with Section 3.2.4 of this document, and in accordance with the LANL-CO Hazard Control Plan for (Carlsbad Facility) Mobile Loading Equipment Storage, Staging, & Maintenance.
- [G] Emergency Response shall be per local authorities (911). When an off-normal event is classified as an emergency, notifications will be made to both LANL-CO management and to the WIPP Central Monitoring Room (CMR).

4.2 Lifting and Handling

4.2.1 Lifting and handling operations at the MLSSF will be conducted in one of two ways:

- [A] *Procured equipment and/or services* - For this case, the NWP procurement system shall be used. In this fashion, the applicable operator training, and/or hoisting, and/or lifting equipment requirements of the DOE Hoisting and Rigging Manual will be passed on to the vendor. As a minimum, specific requirements will be established for equipment inspections and required personnel training and qualifications in the contracting documents. NWP will ensure the specific requirements for procurements are forwarded to the FC for implementation.
- [B] *Use of CCP Forklift* - For this case, equipment maintenance and personnel training programs established at MLSSF are considered adequate to ensure safe and compliant operations.

4.2.2 The FC will ensure that all equipment assisted lifting and hoisting operations include the use of an independent individual (spotter or rigger) to assist the equipment operator in assuring a safe and compliant lift.

5.0 RECORDS

Records which may be generated by the activities at the MLSSF and by CCP documents which are referenced in this plan will be maintained in accordance with the requirements specified in CCP-QP-008, *CCP Records Management*.

CCP-PO-051

Revision 3

CCP/N3B LLC at Los Alamos National Laboratory (LANL) Interface Document

EFFECTIVE DATE: 03/17/2022

Daniel Wade

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	12/18/2019	Initial Issue.
1	01/25/2021	Updated references in all sections. Clarified N3B and CCP responsibilities in Section 3.0. Updated the N3B point-of-contact (POC) title. Clarified Routine Operations requirements in Section 4.2. Updated Work Standards in Section 4.3. Added applicable documents and notifications to Section 4.21. Clarified reporting requirements in Section 4.26. Revised the Figure 2 and 3 Organization Charts.
2	08/05/2021	Minor Change – correcting WIPP Forms to Issue Notices.
3	03/17/2022	Incorporated CCP Standing Order CCP-SO-LANL-73, for Nondestructive Assay (NDA) notifications. Incorporated CCP-SO-LANL-79 and CCP-SO-LANL-75 for real-time radiography (RTR) notifications. Deleted 4.12.2 classified shape notifications as no longer required per disposition of Carlsbad Field Office (CBFO) Corrective Action Report (CAR) 21-016. Additional clarifications and editorial corrections made throughout.

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1.0 PURPOSE

This document establishes the interfaces between the Nuclear Waste Partnership LLC (NWP) Central Characterization Program (CCP) and the Los Alamos National Laboratory (LANL) Environmental Management (EM) operations contracted through Newport News Nuclear BWXT-Los Alamos, LLC (N3B). CCP is operated by NWP at the direction of the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO).

This interface is the mechanism used to delineate the interaction between CCP and N3B, and is not intended to be used in lieu of a task-specific subcontract. Specifically, this document identifies CCP and Host site/generator responsibilities for implementing requirements and deliverables.

1.1 Background

The LANL is a transuranic (TRU) waste generator site in the DOE complex. The EM contractor, N3B, is responsible for the generation and management of waste at various Technical Areas throughout the site. The DOE Environmental Management Los Alamos (EM-LA) Field Office manages/provides oversight for activities specific to EM generated or managed TRU waste.

Through the Performance Management Plan of July 2002, the U.S. DOE CBFO designated the CCP to provide assistance to the waste processing portion of the TRU Program at the LANL site.

1.2 Scope

N3B will provide the infrastructure and associated programs necessary to support all activities described in this Interface Document.

CCP will provide a Waste Isolation Pilot Plant (WIPP)-certified program for the characterization, certification, and shipment of LANL TRU wastes; train and qualify personnel to perform activities under the CCP WIPP-certified program in compliance with DOE Orders relevant to nuclear facilities; provide services, personnel, and equipment to augment N3B required activities at LANL.

This document defines interface requirements between CCP and N3B for the following areas:

- Initial Setup for Operations
- Routine Operations
- Work Standards

- Training Qualification
- Employee Monitoring
- Acceptable Knowledge (AK)
- Container Management
- Visual Examination (VE) and Prohibited Item Disposition (PID)
- Filter Inspection/Filter Change out
- Prescreen Real-Time Radiography (RTR)
- Prescreen Nondestructive Assay (NDA)
- Real-Time Radiography (RTR)
- Nondestructive Assay (NDA)
- Source Control
- Gas Generation Test (GGT)
- Flammable Gas Analysis (FGA)
- Waste Sampling and Analysis Methods
- CCP Project Office Certification Activities
- Transportation
- Measurement and Test Equipment (M&TE)
- Procedures
- Documents/Records
- Procurement
- Deficiencies and Nonconformances
- Quality Assurance (QA)
- Notification
- Price-Anderson Amendments Act (PAAA)
- Authorization Basis (AB) and Configuration Management
- 10 Code of Federal Regulations (CFR) Part 851, *Worker Safety and Health Program*
- Remote-Handled (RH) Waste Stream

These services will be performed with CCP and/or Host site equipment with appropriate DOE/CBFO-certified procedures. The Host site may augment CCP characterization efforts as requested by CCP. Augmented services provided by the Host site shall comply with applicable CCP procedures.

The Host site/generator services covered by this document include programs for Radiological Controls, Occupational Safety and Health, Industrial Hygiene (IH), Nuclear Safety/Authorization Basis (AB), Emergency Management, Work Control, and Environmental/Hazardous Waste Management.

The DOE EM-LA Field Office maintains ownership of the waste, however, N3B manages and maintains the responsibility for its disposal. This responsibility includes additional chemical sampling analysis deemed necessary by the WIPP Co-Permitees.

2.0 REQUIREMENTS

All services provided by CCP will comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC), the Waste Isolation Pilot Plant Hazardous Waste Facility Permit (WIPP-WAP), and Certificates of Compliance for Type B Packages issued by the Nuclear Regulatory Commission and DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD).

2.1 This document implements the applicable requirements of the following:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-94-1012, *Quality Assurance Program Document*, Carlsbad New Mexico, U.S. DOE Carlsbad Field Office
- WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*
- N3B-PD103, *Worker Safety and Health Program*
- N3B-P121, *Radiation Protection*
- N3B-P409, *N3B Waste Management*, and the *LANL Hazardous Waste Facility Permit*.
- N3B-P300, *Integrated Work Management*
- N3B-AP-P300-1, *Integrated Work Control Process*

- N3B-P315, *Conduct of Operations Manual*

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization, certification, and transportation activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, nondestructive examination, which includes RTR, and VE, NDA, FGA for transportation, data validation and verification, waste certification, WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry, and transportation activities. Through the characterization activities performed, CCP provides support to N3B in demonstrating compliance with N3B-P409, *N3B Waste Management*, and the *LANL Hazardous Waste Facility Permit*.

N3B's responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host site/generator documents provided to CCP.

NOTE

Communications paths are depicted on Figure 1, CCP-N3B Communications Flow Chart.

3.1 Operations

3.1.1 CCP performs the following:

- [A] Obtains daily release/approval from N3B Operations Center prior to performing CCP operations.
- [B] Follows work hours established by N3B within operational facilities.
- [C] Obtains prior approval by N3B operations and CCP management for work to be performed outside standard working hours within operational facilities.
- [D] Performs system start-up and calibration of characterization equipment.
- [E] Operates CCP equipment in accordance with approved procedures including CCP-PO-005, *CCP Conduct of Operations*.
- [F] Verifies CCP personnel are trained and qualified in accordance with requirements in Section 4.4 Training.

3.1.2 N3B provides the following to support CCP:

- [A] Radiological controls as needed to support characterization activities, including:
- Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide an approved survey report to the CCP Vendor Project Manager (VPM).
 - Radiological Work Permits (RWP) to support CCP activities.
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Bioassay sample collection, evaluation, and reporting, in accordance with 10 CFR 835.402, *Individual Monitoring*, if applicable. The CCP Project Manager (PM) or CCP VPM will be notified of any positive bioassay results as soon as is reasonably possible.
 - Calibrated and source checked survey instrumentation.
 - Radiological source controls.
 - Radiation dose rate surveys for container certification and shipment.
 - Equipment decontamination.
- [B] Adequate facilities for the safe performance of characterization and transportation activities.
- Electrical power of sufficient quality and the primary connection to the power source, and provide electrical grounding for all CCP facilities/equipment.

- Secondary utilities, such as voice and data communication lines.
- [C] Site-specific training, as needed, to ensure safe operations.
- [D] Industrial Safety and Health (IS&H) support.
- [E] Fire Protection and Emergency Management support.
- [F] AB oversight, including Unreviewed Safety Question (USQ) evaluations.
- [G] Environmental impact oversight and support.
- [H] On-site container transportation.
- [I] Container handling, inventory control, and storage location tracking.
- [J] Calibrated M&TE for use in characterization or obtains calibrated service for CCP provided M&TE.
- [K] Hazardous waste manifesting, bill of lading, and notifications for transportation.
- [L] Qualified personnel to support maintenance of CCP equipment, including but not limited to Electricians.
- [M] Response to and resolution for CCP management assessment and CCP QA surveillance findings related to N3B waste management activities.
- [N] Low pressure 160-L dewars with pressure reading equal or less than 25 psi to support NDA operations.
- [O] Approved vehicles for use by CCP personnel in Area G.
- [P] Transport, placement, and offloading of equipment.
- [Q] Personnel protective equipment (PPE) (e.g., respirators, safety glasses, lab coats) for VE, RTR, NDA, FGA and transportation operations.
- [R] Receiving and storage location for CCP ordered materials and supplies shipped to N3B.

- [S] Secondary waste packaging and disposal.
- [T] Crane services and crane operators for mobile loading activities.
- [U] Management of the facilities, including the maintenance of all transportation related equipment, facilities, forklifts, cranes, loading docks, etc.

3.2 CCP Project Manager (PM)/Designee

- 3.2.1 Ensures that waste characterization activities are conducted for N3B per the Interface Document.
- 3.2.2 Ensures oversight for CCP project safety and compliance is provided.
- 3.2.3 Requests personnel and equipment from the N3B Waste Programs Manager/Designee to support characterization, certification, and transportation, as required.
- 3.2.4 Manages CCP support within agreed to funding and scope.
- 3.2.5 Provides production reports to the DOE/CBFO and N3B Waste Programs Manager/Designee as scheduled by CBFO.
- 3.2.6 Responds to Facility Operations Director (FOD) and N3B Waste Programs Manager/Designee on findings from N3B oversight activities of CCP operations, as required.
- 3.2.7 Interfaces with DOE/CBFO through the CCP Project Office.
- 3.2.8 Requests special nuclear material sources from N3B Waste Programs Manager/Designee.
- 3.2.9 Ensures CCP personnel comply with N3B's integrated work management, environmental, safety, and security requirements.
- 3.2.10 Ensures CCP procedures are approved by N3B, as applicable.
- 3.2.11 Functions as the point of contact (POC) to coordinate CCP reviews of N3B procedures and waste processing plans by appropriate CCP Subject Matter Experts (SMEs).

3.2.12 Ensures that characterization data generated by CCP in the process of waste characterization including RTR, VE, NDA and FGA is available to the N3B Waste Programs Manager/Designee.

3.2.13 Ensures that the N3B Waste Programs Manager is informed of and included in all relevant meetings and discussions involving CCP, WIPP, and the LANL Certified Program (N3B and Triad).

3.2.14 Attends and participates in “Priorities and Critical Path Meeting” weekly or as scheduled by N3B.

3.3 CCP Vendor Project Manager (VPM)

3.3.1 Obtains Host site management daily release/approval prior to performing CCP operations.

3.3.2 Provides primary CCP management oversight for safety and health of CCP personnel at N3B LANL.

3.3.3 Monitors the CCP List of Qualified Individuals (LOQI) daily to confirm that only qualified personnel perform waste characterization and transportation activities.

3.3.4 Ensures Host Site training information, (i.e. required training and next due date) is provided to CCP Training.

3.3.5 Supports training and briefing of personnel in regards to procedural changes by scheduling training sessions, as required.

3.3.6 Controls access of CCP personnel including its subcontractors to the operational areas. Requests site access for visitors and provide full-time escorts.

3.3.7 Functions as CCP’s primary interface and POC between CCP and N3B for characterization activities (operations).

3.3.8 Coordinates CCP daily operations to include subcontractor personnel.

3.3.9 Works in conjunction with N3B Waste Programs Manager/Designee to manage the control, movement, and tracking of waste containers through the CCP characterization process.

3.3.10 Ensures operability and availability of CCP-provided characterization equipment.

- 3.3.11 Ensures that CCP operated equipment is maintained under a CCP approved Configuration Management Program.
- 3.3.12 Ensures that new additions to and/or modifications made to CCP-provided facilities and/or equipment are submitted to N3B Waste Programs Manager/Designee as soon as practicable and approvals are received prior to implementation.
- 3.3.13 Ensures applicable manufacturers Safety Data Sheets (SDSs) for products brought to the facility by the CCP are provided to the N3B Operations Center.
- 3.3.14 Coordinates with the N3B Waste Programs Manager/Designee, and CCP Project Manager/Designee for any potential Noncompliance Tracking System-Reportable PAAA issues or any occurrence reports resulting from activities under the CCP Certified Program.
- 3.3.15 Ensures CCP personnel are enrolled in Host site dosimetry program.
- 3.3.16 Notifies N3B Waste Programs Manager/Designee and N3B Operations Center when CCP personnel invoke stop work or pause work in the event of a safety concern or suspected environmental impact concern.

3.4 CCP Site Project Manager (SPM)

- 3.4.1 Functions as CCP's primary interface and POC between CCP and N3B for certification activities (e.g., data management).
- 3.4.2 Ensures the AK Summary Reports and container lists for LANL waste streams are prepared, approved, and issued.
- 3.4.3 Ensures the preparation and approval of waste stream profile forms (WSPFs), as required.
- 3.4.4 Provides evidence to the CCP Project Manager/Designee and N3B Waste Programs Manager/Designee of the DOE/CBFO PDP participation and successful completion for each operating system.
- 3.4.5 Ensures completion of project level verification and validation of batch data reports (BDRs).

- 3.4.6 Ensures that software used by CCP at LANL is controlled in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*.
- 3.4.7 Provides Acceptable Knowledge Assessments (AKAs) and Basis of Knowledge Evaluations/Exemptions (BoKs), Chemical Compatibility Evaluation Memorandums (CCEMs) and Acceptable Knowledge Summary Reports (AKSRs) to the Site Manager Representative, hereafter referred to as the N3B Waste Programs Manager/Designee for distribution to SME to verify accuracy and completeness and obtain concurrence from the N3B Waste Programs Manager/Designee in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
- 3.4.8 Provides N3B Waste Programs Manager/Designee with the final reports of Enhanced AK, as requested.
- 3.4.9 Coordinates presentation of AK briefings to CCP characterization personnel, POCs, SMEs, and N3B SMEs and Cognizant Personnel (CP).
- 3.4.10 Ensures changes in waste information resulting from notifications by N3B are managed in accordance with the CCP certified program.
- 3.4.11 Informs the appropriate CCP Acceptable Knowledge Expert (AKE) of changes in waste information received from N3B AND provides a documented request to N3B if additional information is required to ensure compliance with the CCP certified program.
- 3.4.12 Provides waste stream tracking information to N3B Waste Programs Manager/Designee, as requested.
- 3.4.13 Provides AKE and N3B Waste Programs Manager/Designee quarterly notifications that Interface Waste Management Document List (IWMDL) are current.
- 3.5 CCP Acceptable Knowledge Expert (AKE)
 - 3.5.1 Collects, compiles, and reviews AK documentation in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.5.2 Ensures CCP has obtained necessary container information prior to characterization.

- 3.5.3 Interacts directly with the N3B Waste Programs Manager/Designee to ensure accurate, sufficient, and up-to-date waste characterization information is provided.
- 3.5.4 Works in conjunction with CCP SPM and N3B Waste Programs Manager/Designee to develop an IWMDL for each waste stream, as applicable.
- 3.5.5 Works with cognizant Host site/generator personnel to resolve comments and questions.
- 3.5.6 Submits IWMDL and associated quarterly N3B Waste Programs Manager/Designee notification to the Site Project Manager (SPM) and to CCP records.
- 3.5.7 Performs Enhanced AK for each waste stream, as applicable.
- 3.6 NWP Qualify Assurance Engineer (QAE)/Designee
 - 3.6.1 Reports to the NWP QA Programs Manager to maintain functional authority and independence from cost and schedule considerations.
 - 3.6.2 Functions as CCP's primary interface and POC for QA issues between the CCP and N3B.
 - 3.6.3 Validates Nonconformance Reports (NCRs).
 - 3.6.4 Provides semi-annual trending summary reports to the CCP SPM.
 - 3.6.5 Ensures surveillances of waste characterization activities at LANL are performed on a periodic basis and surveillance reports are provided to the CCP SPM, the CCP Project Manager/Designee, and the N3B Waste Programs Manager/Designee.
 - 3.6.6 Performs receipt inspection of procured items in accordance with CCP and Host site requirements.
 - 3.6.7 Provides assistance in generation, disposition, and closure of NCRs and Issue Notices.
 - 3.6.8 Coordinates with the CCP Project Manager/Designee for any potential Noncompliance Tracking System-Reportable PAAA issues or any occurrence reports resulting from activities under the CCP Certified Program.

3.7 CCP Waste Certification Official (WCO)

- 3.7.1 Obtains approved WSPF for containers to be certified.
- 3.7.2 Documents and certifies that all TRU waste payload containers meet the requirements of the WAC, and submit the data to the WWIS/WDS for approval.
- 3.7.3 Provides shipping payload documentation to N3B Waste Programs Manager/Designee for concurrence prior to submitting to CBFO for approval.

3.8 CCP Transportation Certification Official (TCO)

- 3.8.1 Ensures CCP Transportation personnel are trained and qualified to perform WIPP-compliant contact-handled (CH)-TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current LOQL.
- 3.8.2 Provides oversight of CCP Transportation personnel for payload and Overpack assembly and loading.
- 3.8.3 Builds payloads from certified containers and Overpacks provided by Waste Certification Officials (WCOs) in WWIS/WDS.
- 3.8.4 Certifies payloads for transportation to and disposal at WIPP.
- 3.8.5 Builds shipments from approved payloads in WWIS/WDS.
- 3.8.6 Provides approved payloads to N3B. For payloads that include New Gen Waste and legacy, provide payloads to both N3B and Triad.

3.9 N3B Waste Programs Manager/Designee

- 3.9.1 Functions as primary POC for N3B with CCP Project Manager for all activities performed by or for CCP (characterization and transportation) in support of EM at LANL.
- 3.9.2 Formally designates N3B personnel responsible for performing key responsibilities and communicates Designees to CCP Project Manager.

- 3.9.3 Ensures cognizant Host facility and generator POCs/SMEs are identified and available as necessary to support the review of CCP documents.
- 3.9.4 Ensures N3B participation on CBFO scheduled LANL site status calls.
- 3.9.5 Functions as the POC with CCP Project Manager for coordination and review and approval of documents required for enhanced AK process, as required.
- 3.9.6 Coordinates review, provides comments, and approves comment resolution on documents listed in Section 4.21.5. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
- 3.9.7 Ensures CCP procedures, equipment, and facilities undergo Host site review and Unreviewed Safety Question Determination (USQD) as required.
- 3.9.8 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
- 3.9.9 Ensures needed site support, such as radiological safety and Industrial Safety (IS), IH, Fire Protection Program (FPP), and Lockout/Tagout (LO/TO), Facility Service Requests (FSRs), work control, Source Custodian, and waste handling resources are available for CCP activities.
- 3.9.10 Ensures documentation of completed Host site-specific training is provided to CCP VPM and CCP Training.
- 3.9.11 Participates in Readiness Assessments or surveillances, as required.
- 3.9.12 Makes special nuclear material sources available to CCP and provides support to maintain nuclear material source control in accordance with N3B requirements.
- 3.9.13 Designates N3B CP to interact with the CCP AKE and assist the AKE with AK collection of required documents and information.

- 3.9.14 Ensures compliance with Policy N3B-P409.
- 3.9.15 Ensures periodic surveillances of CCP operations by the Host site are conducted and reported to the CCP Project Manager/Designee.
- 3.9.16 Notifies the SPM and AKE in writing of any new or revised waste management activities that would require a change to the IWMDL.
- 3.9.17 Ensures a formal communication process is implemented and documented information provided to CCP SPM/Designee to identify and communicate any changes in waste information pertinent to TRU waste containers including new containers, container type changes, filter change information, waste stream changes, U.S. Environmental Protection Agency (EPA) hazardous waste number (HWN) assignment, etc.
- 3.9.18 Provides N3B procedures and waste processing plans that can impact the CCP characterization process as well as the applicable waste acceptance to CCP AKE and SPM.
- 3.9.19 Provides documentation of assessments, surveillances, and audits, applicable to CCP, to the CCP Project Manager/Designee and to NWP QA Engineer.
- 3.9.20 Ensures that CCP is notified prior to approval and implementation of new and/or modification to documents or equipment for work performed in support of TRU waste activities.
- 3.9.21 Ensures configuration management of N3B-owned equipment is maintained.
- [A] Ensures that adequate information is provided to CCP on N3B-owned equipment prior to acceptance and turnover of equipment to CCP.
- 3.9.22 Ensures a process is implemented to prevent the assignment of HWNs to transportation overpacks that have not been applied to the certified inner waste containers.
- 3.9.23 Notifies the SPM and AKE in writing of any new or missing chemicals or materials expected to be present in TRU waste that would necessitate a change to the CCEM.

3.10 Facilities Operations Director (FOD)/Designee

3.10.1 Ensures CCP/N3B personnel comply with N3B integrated work management, environmental, safety, and security requirements through document reviews, emergency drills, monitoring, surveillances, and audits.

3.10.2 Ensures new CCP activities follow the N3B readiness review requirements.

3.10.3 Ensures Technical Safety Requirements surveillances are conducted as required.

3.10.4 Ensures Fire Protection and other facility surveillances, are performed when required.

3.10.5 Releases approved CCP Work Packages (WPs).

3.11 Shift Operations Manager

3.11.1 Ensures line management authority is assigned to ensure CCP operations are adequately conducted to support the N3B mission.

[A] Responsible for the day-to-day assignment of a sufficient number of qualified Host site personnel to augment operations under CCP procedures to meet commitments.

[B] Provides work authorization and release in accordance with Host site policies and procedures for CCP operations.

[C] Acts as the direct line of communication to Host site support organizations and services in support of CCP operations.

3.12 N3B Mission Assurance Director/Designee

Reports to N3B Program Director to maintain functional authority and independence from cost and scheduled considerations.

3.12.1 Functions as N3B's primary interface and POC for QA issues between N3B and CCP.

3.12.2 Provides oversight of activities performed in support of this interface agreement using N3B and CCP programs and procedures.

3.13 Environment, Safety, and Health (ES&H) Support

- 3.13.1 Provides workplace monitoring, as applicable to the hazards associated with the work and workplace.
- 3.13.2 Provides safety and health compliance reviews, reviews and approves WPs, and assures compliance with the N3B safety and health requirements applicable to the CCP operations.
- 3.13.3 Ensures compliance with the LANL Hazardous Waste Facility permit, and all other environmental compliance requirements.

4.0 INTERFACE

4.1 Initial Setup for Operations

- 4.1.1 The initial setup and startup of CCP characterization operations have been completed. In addition, the initial certification audit is complete and operations have commenced.
- 4.1.2 N3B will provide infrastructure support as additional pieces of equipment or operations are added to the N3B scope.

4.2 Routine Operations

NOTE

Working shifts will be established by the CCP VPM and approved by the N3B Waste Programs Manager/Designee prior to implementation.

- 4.2.1 The Host site has the overall responsibility for the management of the nuclear materials and operations of the nuclear facilities.
- 4.2.2 Work performed by CCP personnel (including subcontractors) will be in compliance with Host site and CCP requirements.
- 4.2.3 CCP personnel will STOP WORK (or Pause), as appropriate and will notify the N3B Operations Center and the CCP VPM in the event of a safety concern or suspected environmental impact concern.
- 4.2.4 CCP shall provide N3B evidence of annual recertification by CBFO. Correspondence indicating New Mexico Environmental Department (NMED) and EPA approval of the CBFO certification audit report will be provided. Continuous certification of all characterization activities will be maintained for the duration of the work.
- 4.2.5 Any proposed changes by N3B to approved facilities, equipment, processes, or procedures for which CCP is responsible, must be submitted for review by CCP before implementation. Agreement between N3B and CCP must be reached before any changes are approved and implemented to ensure other operations for each line are not impacted.

4.3 Work Standards

4.3.1 CCP VPM or Designee will perform the following activities to support daily operations:

- [A] Ensure that work is performed in accordance with N3B requirements (e.g., LO/TO, Work Control, WP) by trained and qualified personnel in accordance with approved work documents.
- [B] Support an investigation when an abnormal condition or occurrence, is identified, as required.
- [C] Ensure disposition of NCRs and Issue Notices as required, and communicate progress to the CCP Project Manager/Designee and N3B Waste Programs Manager/Designee.
- [D] Ensures notifications are made to the CCP Project Manager, and N3B Waste Programs Manager/Designee when assay results exceed facility limits for criticality spacing and/or AB limits as specified in subsection 4.13 NDA.
- [E] Ensure that equipment calibration is performed on CCP operated equipment, in accordance with Section 4.20.
- [F] Attend pre-operations briefings performed for all on-site waste characterization personnel and attend the N3B Plan of the Day/Week briefings, as appropriate.
- [G] Ensure the safe operation and maintenance of equipment by CCP personnel by performing periodic oversight.
- [H] Prior to introducing new chemicals into the facility, provide a copy of SDSs to the FOD, Operations Center, the CCP Project Manager/Designee, SPM, N3B Waste Programs Manager/Designee, and others as appropriate, to ensure that the Chemical Inventory requirements are maintained.

4.3.2 CCP SPM or Designee will perform the following activities to support daily operations:

- [A] Ensure disposition of NCRs and Issue Notices, as required, and communicate progress to the CCP Project Manager/Designee.

4.3.3 N3B Radiation Protection Manager/Designee will ensure the following radiological control support is provided for CCP activities:

- [A] Maintain radiological postings.
- [B] Perform an initial and periodic radiation protection surveys on NDA and RTR equipment and provide an approved survey report to the NDA Team Leader or RTR Team Leader, and the VPM.
- [C] Perform radiation protection surveys and monitoring as necessary.
- [D] Provide thermoluminescent dosimeters for CCP personnel.
- [E] Provide calibrated and source checked survey instrumentation as required.
- [F] Issue and/or modify Radiation Work Permits (RWPs) to support CCP activities as needed.

4.3.4 CCP personnel will perform the following activities in support of CCP Operations:

- [A] Follow site requirements for LO/TO.
- [B] Perform work in accordance with CCP-approved procedures for waste characterization and certification activities and N3B approved work packages and procedures for non-waste characterization activities (e.g., equipment repairs).
- [C] Operate in accordance with CCP-PO-005.
- [D] Develop WPs or other applicable documents, with assistance from N3B Environment, Safety and Health (ES&H) personnel, for all CCP activities performed for N3B in accordance with N3B policies and submit to the N3B CH-TRU Programs Manager/Designee for approval.

4.4 Training Qualification

- 4.4.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.4.2 CCP personnel assigned to field operations must complete the Host site-specific training. The N3B Waste Programs Manager/Designee will ensure the Host site-specific training documentation is provided to CCP Training.
- 4.4.3 Both the CCP training and Host site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.4.4 Administrative work, such as BDR reviews requiring no access to the characterization equipment or processes at the Host site, may be completed by personnel who have not completed the required Host site-specific training. Personnel who have not completed Host site-specific training will not be allowed unescorted access to the characterization equipment.
- 4.4.5 The CCP LOQI for LANL will be monitored daily by the CCP VPM to confirm CCP personnel are qualified.

4.5 Employee Monitoring

- 4.5.1 CCP will participate in the N3B radiological monitoring program as required by the radiological work permit process governing work performed.
- 4.5.2 The CCP Project Manager or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of material/waste may have occurred or if CCP personnel are required to resubmit bioassay samples as soon as is reasonably possible.
- 4.5.3 N3B Radiation Protection personnel will perform routine surveys and monitoring for contamination and radiation as specified in N3B policies or procedures. The CCP Project Manager/Designee or CCP VPM and appropriate N3B management personnel will be notified immediately upon the discovery of any loose surface contamination on any CCP-operated characterization equipment.

Access to copies of routine survey results will be made available to CCP upon request.

- 4.5.4 N3B will provide the CCP Project Manager/Designee with the results of continuous or fixed air sample filter analysis as soon as the analysis is complete for any monitored area routinely occupied by CCP personnel, as requested.

4.6 Acceptable Knowledge (AK)

- 4.6.1 CCP records personnel in Carlsbad will maintain the auditable AK record necessary to support the AK Summary Report in accordance with CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, and CCP-QP-008, *CCP Records Management*.

- 4.6.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005.

[A] Host site/generator personnel assist CCP AK personnel with AK collection.

[B] CCP AK personnel and Host site/generator personnel will cooperate fully with each other in the sharing and exchange of any and all AK information that is collected for or incorporated into Enhanced AK or AKSRs.

[C] The N3B Waste Programs Manager/Designee will provide assistance by coordinating potential interviewees for CCP. The N3B Waste Programs Manager/Designee will ensure CP are available to serve as an intermediary and an active listener to support effective generator questioning.

- 4.6.3 CCP AK personnel and Host site/generator personnel develop an IWMDL that includes facility processes, plans, and procedures, waste profile forms, and Waste Compliance and Tracking System records that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging

- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

4.6.4 The AKE develops the new or revised IWMDL in accordance with CCP-TP-005 using the existing body of AK documentation.

[A] The N3B Waste Programs Manager/Designee ensures CP are assigned to review the new or revised IWMDL for accuracy and completeness and provide written comments as appropriate.

[B] The AKE and CP resolve comments and questions.

[C] CCP AKE ensures the new or revised IWMDL posts to the CCP secure file transfer protocol (sftp) site.

4.6.5 CCP submits new or revised AK Summary Reports and Enhanced AK Reports (CCE, AKA, and BoK) to the N3B Waste Programs Manager/Designee for review and concurrence.

[A] The N3B Waste Programs Manager/Designee ensures CP review the documents for accuracy and completeness and provides comments as needed.

[B] AKE resolves comments with N3B Waste Programs Manager/Designee and CPs through the CCP-QP-010 process.

[C] N3B Waste Programs Manager/Designee concurs with final reports in accordance with CCP-QP-010.

4.6.6 All Host site/generator CPs attend CCP briefings on new or revised AK Summary Reports.

4.6.7 N3B Waste Programs Manager/Designee notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to the IWMDL.

4.6.8 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AK Summary Report is needed.

4.6.9 The Host site will not provide any waste container to CCP for certified characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repackage the container.

[A] The work document(s) provided to the AKE will contain the following information at a minimum:

- Identification (including revision) of the work document(s) used to generate the container
- Type of activity (e.g., packaging/repackaging only, remediation, treatment)
- Amount (estimated) and type (if known) of liquids
- Type and quantity (estimated) of absorbents used
- Type and quantity (estimated) of neutralization agents used
- Any unexpected conditions or reactions encountered
- General description of waste items, and more detailed descriptions including potential chemical contaminants upon request
- Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
- Filter data including model and quantity used
- Parent container identification

4.6.10 The AKE will verify they have obtained and reviewed the correct version of IWMDL documentation used to generate/manage a container before adding it to the AK Tracking Spread Sheet.

- 4.6.11 At a minimum of once per quarter, the N3B Waste Programs Manager/Designee will review the current IWMDL and provide written assurance to the CCP SPM and AKE that the list is up to date OR provide necessary documentation to revise the list.

4.7 Container Management

NOTE

CCP-TP-068, *CCP Standardized Container Management*, replaced CCP-TP-120, *CCP Container Management*, as the CCP standardized procedure for Container Management. When presented for characterization, containers which have a traveler from CCP-TP-120 will have a traveler from CCP-TP-068 applied and completed.

- 4.7.1 N3B will provide waste to the characterization facilities, depending upon certification and characterization capabilities. All CH containers delivered for characterization will be approved by the CCP VPM as prescribed in CCP-TP-068.
- 4.7.2 N3B Waste Programs Manager/Designee will provide documented information to the CCP SPM/Designee on any modification to containers or contents of the container (to include overpacking) after the container has been submitted to the certified program (i.e., placed on the AKTSS or completed CCP VE characterization process).
- 4.7.3 The CCP SPM/Designee will review the documented information for modified containers and will notify the N3B Waste Programs Manager/Designee when the containers are approved for entrance into the characterization process.
- 4.7.4 N3B is responsible for movement of containers and implementing vehicle access controls, from characterization through shipment, including control of containers requiring remediation (prohibited items).
- [A] N3B and CCP will perform site container management in accordance with the applicable procedures. This includes verification that the containers are included in the AK Tracking Spreadsheet for characterization by CCP and ensuring that the N3B operating record is kept up to date with container movements.

- 4.7.5 CCP is responsible for administratively tracking the containers throughout the CCP characterization processes. Personnel will perform container management actions in accordance with CCP-TP-068.
- 4.7.6 N3B will provide the necessary dose rate and surface contamination information to CCP to certify the containers for disposal (e.g., survey results). All containers will have a Health Physics Materials Survey tag attached to the container prior to movement to CCP for characterization.
- 4.7.7 If a nonconformance is identified with a container, during the characterization or certification process, the container will be controlled in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
- 4.8 Visual Examination (VE), Repackaging, and Prohibited Item Disposition (PID)
 - 4.8.1 Repackaging operations will have oversight by CCP qualified VE Personnel or performance of VE characterization, as required.
 - 4.8.2 Prohibited Item Disposition (PID) will be conducted on containers in accordance with approved Host site procedures with oversight by CCP VE trained personnel or performance of VE characterization, as required.
- 4.9 Filter Inspection/Filter Change out
 - 4.9.1 N3B/CCP personnel will inspect the filters on containers as part of the container acceptance and will document whether the filter is a WIPP-approved filter. This information will be transmitted to the CCP VPM.
 - 4.9.2 If filter change out is performed on containers that do not require repackaging, the operation will be documented and the information transmitted to the CCP VPM.
 - [A] If CCP performs the filter change out, a copy of the Attachment 1, Container Filter Vent Change Out Form, from CCP-TP-082, *CCP Waste Container Filter Vent Maintenance and Operation*, will be provided to the VPM. An Information Only copy of Attachment 1 will be provided to N3B.

[B] If N3B performs the filter change out using an N3B procedure, the filter change information will be provided to the CCP VPM.

4.9.3 CCP personnel also inspect and verify filter models on containers as part of the FGA sampling process.

4.10 Prescreen Real-Time Radiography (RTR)

4.10.1 CCP personnel will perform prescreening for RTR to identify potentially certifiable containers that can be sent to RTR, as determined by N3B and agreed to by the CCP Project Manager/Designee. This information will be documented using CCP-TP-078, *CCP LANL Info Scan Radiography Procedure*, and provided to the N3B Waste Programs Manager/Designee.

4.10.2 Using funding provided by N3B, CCP will perform additional pre-screening as requested by N3B to support N3B waste characterization activities (e.g., low-level waste and mixed low-level waste).

4.10.3 When any amount of liquids are identified in a waste container, the RTR Operator will make notifications to the N3B Waste Operator supporting RTR operations, and the VPM, who will notify the N3B Waste Programs Manager/Designee. The information will also be included in the end of shift email sent each day summarizing process status and activities.

4.11 Prescreen Nondestructive Assay (NDA)

4.11.1 CCP personnel will perform prescreening for NDA as requested by N3B and agreed to by the CCP Project Manager/Designee. Datasheets and flat files generated during this prescreening will be provided to the N3B Waste Programs Manager/Designee to assist in container disposition by N3B.

[A] Containers that are less than 100 nanocuries per gram (nCi/g) will be returned to the Host site for disposition. BDR information on these containers will be provided as part of the process of returning the container to N3B.

4.12 Real-Time Radiography (RTR)

4.12.1 Containers found with prohibited items or conditions requiring remediation (e.g., unvented container liner, liquids not meeting permit requirements) will be flagged, an NCR initiated, and staged for remediation at a later date.

[A] CCP RTR Operators will notify the N3B Operations Center, and the VPM, who will notify the N3B Waste Programs Manager/Designee if containers are found to contain compressed gas cylinders.

4.12.2 CCP RTR Operators may provide additional interpretation of scans to support other N3B repackaging activities and waste characterization/re-characterizations determined by N3B and agreed to by the CCP Project Manager/Designee.

4.12.3 When any amount of liquids are identified in a waste container, the RTR Operator will make notification to the N3B Waste Operator supporting RTR operations, and the VPM, who will then notify the N3B Waste Programs Manager/Designee. The information will also be included in the end of shift email sent each day summarizing process status and activities.

4.13 Nondestructive Assay (NDA)

4.13.1 If assay results indicate that a container exceeds the WAC limits for plutonium equivalent activity, criteria, CCP personnel will issue an NCR in accordance with CCP-QP-005 and notify the N3B Waste Programs Manager/Designee.

4.13.2 For any containers that exceed the shipping limit for FGE, an NCR will be generated in accordance with CCP-QP-005 to return the containers to N3B for repackaging and notify the N3B Waste Programs Manager/Designee.

4.13.3 For any containers that are less than 100 nCi/g, an NCR will be generated in accordance with CCP-QP-005 to return the containers to N3B and notify the N3B Waste Programs Manager/Designee.

4.13.4 N3B will provide/refill low pressure 160-L dewars of liquid nitrogen with pressure reading equal or less than 25 pounds per square inch (psi), but not less than 22 psi for NDA operations.

- 4.13.5 **IF** during data acquisition, measured results exceed any of the below facility AB or criticality spacing limits,
THEN the NDA Operator shall immediately notify the N3B Waste Programs Manager/Designee, the N3B Operations Center, the CCP Project Manager/Designee, and the CCP Vendor Project Manager (VPM).
- [A] Measured FGE results with two times the total measurement uncertainty (TMU) for 55-gallon drums, 85-gallon drums, or Pipe Overpack Containers (POCs) exceed 200 FGE or standard waste boxes (SWBs) exceed 325 FGE
 - [B] 55-gallon drums, 85-gallon drums, or POCs exceeding 80 PE-Ci; Direct-Loaded SWBs exceeding 560 PE-Ci; Overpacked SWBs exceed 1100 PE-Ci (individual contained container)
 - [C] Containers found to exceed the Pu mass calibration range of the NDA instrument
 - [D] After validation of the results by the CCP NDA Expert Analyst (EA), per normal CCP protocols and timelines, for new waste assays, re-assays, or re-analysis of existing spectral data, the measured assay results exceed the above listed values, the CCP NDA EA shall notify (via email) the N3B Operations Center, the CCP VPM, the CCP Project Manager/Designee, and the N3B Waste Programs Manager/Designee; and generate an NCR with the BDR.

4.14 Source Control

- 4.14.1 N3B will be responsible for all NDA sources used for both calibration (reference sources) and for the DOE/CBFO PDP. Responsibilities include inventory control, storage, inspection and handling. Also, ensuring radiological control support associated with sources is provided, maintaining the Radioactive Materials Area postings and periodic surveys, and performing a semi-annual leak check on the reference sources.
- 4.14.2 N3B will provide support for the participation in the NDA PDP. This support includes training PDP coordinators, preparation of the test matrix containers, delivery of the containers to the NDA equipment, and responsibility for PDP source control. LANL support will be coordinated by the N3B Waste Programs Manager/Designee.

4.14.3 N3B, as custodian of the sources, will provide to CCP the necessary reference sources for calibration in accordance with CCP NDA calibration procedures.

4.15 Gas Generation Testing (GGT)

4.15.1 Upon certification of the GGT process, CCP will perform GGT sampling and analysis using GGT canisters in accordance with CCP-TP-083, *CCP Gas Generation Testing*, and CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*.

4.16 Flammable Gas Analysis (FGA)

4.16.1 FGA is used for transportation only and will be performed using approved DOE/WIPP procedures by personnel trained under the CCP Qualification Program.

4.16.2 Lower Flammability Limit gas sampling and analysis will be performed at N3B request and CCP PM approval.

[A] Raw Data will be provided to N3B Waste Programs Manager/Designee.

4.16.3 FGA operators will notify the N3B Waste Programs Manager/Designee, the CCP Project Manager/Designee, and the CCP VPM if after completion of the analysis, the containers exceed the facility designated limits per CCP Site Specific Standing Order.

4.17 Waste Sampling and Analysis Methods

4.17.1 If the WIPP Permittees determine that additional characterization is necessary using chemical sampling and analysis, the Permittees shall request generator/storage site to provide the Permittees with the following documentation:

- Sampling and analysis plan (SAP)
- EPA SW-846 test method(s), or functionally equivalent test method(s), to be used
- Identification of the laboratory(ies) that will be performing the test(s)

4.17.2 Upon the Permittees written approval of the sampling and analysis plan, the generator/storage site shall implement the sampling and analysis plan.

4.18 CCP Project Office Certification Activities

4.18.1 CCP Project Office certification activities consist of project-level review of BDRs, lot evaluations, data validation, and WWIS/WDS data entry.

4.18.2 Data validators are responsible for completing the required checklists, resolving comments, and ensuring records are complete.

4.18.3 WWIS/WDS personnel will ensure information is entered into WWIS in accordance with CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*.

4.18.4 The WCO will certify and transmit characterization and certification data using the WWIS/WDS and approved procedures.

4.18.5 The WCO will document and certify that all TRU waste payload containers prepared from the certified process for WIPP meet all of the requirements of CCP-PO-001, CCP-PO-002, and CCP-PO-003.

4.18.6 The WCO will provide the Transportation Certification Official (TCO) with all certification information necessary to certify the payload for transportation.

4.19 Transportation to WIPP

4.19.1 Transportation certification and preparation of the shipment of certified packages (e.g., Transuranic Package Transporter-II [TRUPACT-II], TRUPACT-III, or HalfPACT) will be conducted using personnel trained under the CCP Certified Program.

4.19.2 CCP will provide TRUPACT-II, TRUPACT-III, HalfPACT, and CH loading training to N3B employees, as required, to maintain certifications required for transportation activities.

4.19.3 N3B will provide manifesting, marking, labeling and placarding of the shipments in accordance with Title 40 CFR, *Protection of Environment*, Title 49 CFR, *Transportation* requirements, and site-specific procedures.

- 4.19.4 N3B will verify and ensure that containers being shipped to the loading area do not exceed AB material at risk inventory.
- 4.19.5 N3B will track Material-At-Risk (MAR) inventory at loadout facility.
- 4.19.6 The TCO will inspect the containers and verify that the filter installed on the containers to be shipped meet WIPP requirements and match information submitted during waste certification.
- 4.19.7 Waste will be loaded and prepared for transport to WIPP in accordance with DOE-approved operating procedures.
- 4.19.8 The TCO will provide documentation to the N3B Waste Programs Manager/Designee certifying the waste for shipment in accordance with CCP procedures.
- 4.20 Measurement and Test Equipment (M&TE)
 - 4.20.1 The CCP M&TE Custodian will provide recall notification for CCP M&TE that requires calibration to the CCP Project Manager/Designee. M&TE requiring calibration will include such things as weight scales, infrared thermometers, temperature data-loggers, torque wrenches, electronic calibrators, digital readouts, and pressure transducers.

NOTE

N3B must be on the NWP QSL before M&TE can be submitted for use in CCP.

- 4.20.2 N3B will provide National Institute of Science and Technology - traceable calibration services for specified M&TE. N3B will maintain records on M&TE calibration in accordance with its quality program requirements. N3B will provide copies of the Certificates of Calibration for these items of M&TE to the CCP VPM and the CCP M&TE Custodian via the CCP Project Manager/Designee prior to issuing M&TE to CCP for use.
- 4.20.3 N3B will notify the CCP M&TE custodian when M&TE are added, deleted, found out-of-tolerance/defective or failed calibration by the Host site.

4.21 Procedures

4.21.1 The N3B Waste Programs Manager/Designee will send N3B procedures and waste processing plans to the CCP Project Manager/Designee for review by the appropriate SMEs for determination of potential impact to the CCP characterization processes as well as requirements specified in WIPP-WAC; Contact-Handled Transuranic Waste Authorized Methods for Payload Control (CH-TRAMPAC); WIPP-WAP.

[A] As warranted, the CCP Project Manager/Designee will provide written comments from the CCP review of N3B documents to the N3B Waste Programs Manager/Designee for resolution.

[B] N3B Waste Programs Manager/Designee will confirm with the CCP Project Manager/Designee that CCP written comments are resolved and that any impacts to WIPP disposition are understood.

[C] N3B, at its discretion, may request objective evidence to support the competency of CCP reviewers.

4.21.2 Editorial or minor changes may be made without the same level of review and approval as the original document as defined in CCP-QP-010, however USQ review is still required prior to reissue.

4.21.3 New Technical Operating Procedures (procedures that operate equipment) developed by CCP and scheduled to be used at the Host site, shall be evaluated by the Host site N3B Waste Programs Manager/Designee to determine if the procedure shall be added to the Host site review lists defined in step 4.21.5.

4.21.4 All characterization procedures, which physically manipulate the waste (e.g., VE) or the waste container (e.g., RTR or NDA) and all revisions to these procedures, will be provided to the N3B Waste Programs Manager/Designee, by the CCP Project Manager/Designee for review (e.g., USQD, AK evaluation, Health & Safety Review and Implementation), before approval by DOE/CBFO and implementation by CCP.

4.21.5 The N3B Waste Programs Manager/Designee will designate the appropriate reviews of the documents listed below (which do not meet the criteria of step 4.21.2 and do not affect the AB) and forward written comments to CCP Document Control in accordance with CCP-QP-010 for resolution. For operational procedures that CCP is not currently operating to, the N3B Waste Programs Manager/Designee may waive the review until CCP operations commence on site. When CCP operations return to the site, the N3B Waste Programs Manager/Designee will be provided all procedures listed below for review.

CCP Documents:

- CCP LANL AK Summary Reports
- CCP LANL WSPFs
- CCP IWMDLs
- CCP AKA, BoK, & CCEM
- CCP-CM-024, *CCP High Efficiency Neutron Counter (HENC-02) (Equipment #NDA-HENC-02) Equipment Description*
- CCP-CM-029, *CCP High Energy Real-Time Radiography System HE-RTR*
- CCP-CM-032, *CCP Super High-Efficiency Neutron Counter (SuperHENC) (Equipment #NDA-SHENC-02) Equipment Description*
- CCP-CM-037, *CCP Mobile ISOCS Large Container Counter #1 (MILCC1) (Equipment #NDA-MILCC-01) Equipment Description*
- CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*

- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-058, *CCP NDA Performance Demonstration Program*
- CCP-TP-059, *CCP Operating the Super High Efficiency Neutron Counter (SHENC) Using NDA 2000*
- CCP-TP-063, *CCP Operating the High Efficiency Neutron Counter Using NDA 2000*
- CCP-TP-064, *CCP Calibrating the High Efficiency Neutron Counter and the Super High Efficiency Neutron Counter Using NDA 2000*
- CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-077, *CCP Calibrating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-078, *CCP LANL Info Scan Radiography Procedure*
- CCP-TP-082, *CCP Waste Container Filter Vent Maintenance and Operation*
- CCP-TP-083, *CCP Gas Generation Testing*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-103, *CCP Data Reviewing, Validating, and Reporting Procedure for the NDA Counters at LANL Using NDA 2000*
- CCP-TP-113, *CCP Standard Visual Examination*
- CCP-TP-140, *CCP Equipment Maintenance*
- CCP-TP-198, *CCP HE-RTR Operating Procedure*

4.21.6 Other CCP Procedures will be provided to N3B upon request.

NOTE

This note applies to step 4.21.7. Examples of cognizant personnel may include, but is not limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

4.21.7 Upon receipt of a document listed in step 4.21.5, the N3B Waste Programs Manager/Designee will ensure the document is reviewed by cognizant personnel responsible for the waste management activities relevant to the scope of the document.

4.21.8 As warranted, the N3B Waste Programs Manager/Designee will provide written comments to CCP using Document Review Record in accordance with CCP-QP-010.

4.21.9 CCP, at its discretion, may request objective evidence to support the competency of Host site/generator reviewers.

4.21.10 The CCP Project Manager/Designee will confirm with the N3B Waste Programs Manager/Designee that N3B written comments are resolved and N3B concurrence is provided prior to proceeding with CCP operations under the scope of the document being reviewed.

4.21.11 The following documents, and all revisions to these documents, will be provided to the N3B Waste Programs Manager/Designee as "Notify Only" by CCP during the review process:

- CCP-PO-005, *CCP Conduct of Operations*

4.21.12 The following documents and all revisions are controlled by CBFO. Upon receiving notification of issue/revision, CCP will notify the Host site for USQ screening prior to implementation at the Host site.

- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-02-3184, *CH Packing Operations Manual*
- DOE/WIPP-02-3185, *CH Packaging Maintenance Manual*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*.

4.21.13 Other controlled documents used by CCP are available to the Host site N3B Waste Programs Manager/Designee for information purposes at the sftp site.

4.22 Documents/Records

4.22.1 All AK documents generated at N3B must be reviewed prior to release by a Derivative Classifier (DC) as detailed in DC guidance documents.

4.22.2 In addition, any document created by CCP or N3B that is intended for public release must be reviewed and processed for Unclassified Controlled Nuclear Information review and Public Release review prior to release.

NOTE

Documents listed in steps 4.22.3 and 4.22.4, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence.

4.22.3 Documents to be provided by N3B after completion of DC review to CCP personnel include copies of the following:

- [A] Existing AK documentation including, but not limited to: source documents, spreadsheets, NCR, VE, PID information, and characterization raw data.
- [B] Changes to container data information after AK has been collected and/or reconciled.

- [C] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to characterization activities.
- [D] Radiological dose rate and surface contamination results on waste drums as needed to support WDS data entry.
- [E] Copies of calibration certifications for M&TE used by CCP.

4.22.4 Documents to be provided by CCP (No DC review required) to N3B personnel, as applicable, include copies of the following:

- [A] Completed BDRs for all processes.
- [B] Copy of WSPF for concurrence.
- [C] Copy of AK Summary Reports for concurrence.
- [D] Lot Evaluation documentation.
- [E] Completion of CCP Training/LOQI updates.
- [F] AK Tracking Spreadsheet.
- [G] NCRs and Issue Notices generated.
- [H] Other reports generated to support a certified program.
- [I] Daily Production Reports.
- [J] CCP IWMDLs.

4.22.5 Documents that are generated at N3B during the implementation of the TRU waste characterization and disposal at WIPP will be processed through the CCP Records process in accordance with CCP-QP-008. After completion of all activities, or sooner if no longer needing to support the active record, the records will be transmitted to the WIPP Records Archive for retention.

4.23 Procurement

NOTE

N3B must be listed on the NWP QSL in order to procure, inspect, and perform receipt inspection of items listed in the most current NWP QSL for the CCP scope of work. N3B will perform these activities in accordance with its QSL-accepted program.

4.23.1 Qualified N3B personnel may procure, inspect, and perform receipt inspection of U.S. Department of Transportation Type 7A containers, filters, gases, and various non-quality affecting items for certified CCP operations in accordance with N3B procurement requirements.

4.23.2 N3B personnel will perform procurement activities in accordance with its QSL-accepted program.

4.23.3 CCP may procure, inspect, and perform receipt inspection of quality-affecting items (e.g., DOT Type 7A containers, filters, and gases) and various nonquality affecting items for certified operation in accordance with CCP procurement requirements. Quality-related procurements ordered by CCP require a CCP receipt inspection only; they DO **NOT** require a N3B QA receipt inspection. Documentation of these inspections will be made available to the N3B QA upon request.

4.23.4 All procurements for commodities (e.g., Pipe Overpack, standard waste box, etc.) procured through CBFO's Centralized Procurement Program will require N3B receipt inspection. For a full list of items refer to webpage <http://www.wipp.energy.gov/library/cpp/cpp.htm>.

4.24 Deficiencies/Nonconformances

4.24.1 If either N3B or CCP personnel, identify a nonconformance condition associated with a waste container during the characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.

4.24.2 The CCP Project Manager/Designee will notify the N3B Waste Programs Manager/Designee of nonconformances by the distribution of NCRs. The N3B Waste Programs Manager/Designee may request any supporting documentation as needed.

NOTE

In some cases, N3B will perform the work required to resolve deficiencies identified in CCP NCRs and will initiate internal documentation as required by the N3B program. However, the CCP NCRs will remain open and CCP NCR Hold Tags will remain on the affected containers until resolution of the NCR condition has been confirmed by CCP under its program. At that point, CCP will close the NCRs and remove the NCR Tags.

4.24.3 If the nonconformance can **NOT** be resolved by CCP (e.g., certain prohibited items or non-certifiable container types), CCP will coordinate with the N3B Waste Programs Manager/Designee to determine the actions to be taken.

4.24.4 CCP will notify the FOD, N3B Waste Programs Manager/Designee, and the CCP Project Manager/Designee immediately of occurrence reports or potential PAAA issues resulting from the CCP scope of work.

4.24.5 The NWP QA will confirm appropriate closure of deficiencies and the SPM will notify N3B of status.

4.24.6 The N3B Waste Programs Manager/Designee will notify the CCP Project Manager/Designee immediately of occurrence reports or potential PAAA issues affecting the CCP scope of work.

4.25 Quality Assurance (QA)

4.25.1 All quality affecting work performed in the completion of this waste characterization, certification, and transportation scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.

4.25.2 NWP-QA will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.

4.25.3 The Host site will conduct documented surveillances/observations to assess compliance with applicable procedures.

4.26 Notification

4.26.1 N3B shall notify CCP prior to implementing changes in the Host site facilities used by CCP for characterization activities or changes that may impact operations.

- 4.26.2 N3B shall notify CCP when there are changes to policies, processes, or procedures that may affect CCP characterization activities or operations.
- 4.26.3 N3B shall notify CCP prior to making repairs or modifications to transportation trailers or packaging equipment (TRUPACT-II, HalfPACTs, etc.). CCP will then notify the appropriate cognizant engineer at the WIPP site. The cognizant engineer will verify the modification/repair.
- 4.26.4 N3B shall notify CCP when the criteria for reporting container conditions change.
- 4.26.5 N3B shall ensure a formal communication process is implemented to identify and communicate to CCP any changes in waste information pertinent to TRU waste including: generation of new containers, repackaging of existing containers, changes in closure dates, container type changes, filter change information, waste stream changes, EPA HWN assignment, or any change that can affect the acceptability of the container by WIPP.
- 4.26.6 CCP shall ensure changes to equipment are in accordance with CCP-CM-001, *CCP Equipment Change Authorization and Documentation*.
- 4.26.7 CCP shall notify the Host site when there are configuration changes to CCP-provided equipment.
- 4.26.8 CCP shall provide a documented request to N3B if additional information is required to ensure compliance with the CCP certified program, if N3B's notification of changes in waste information appears to be inadequate or when CCP determines further investigation is warranted.
- 4.26.9 CCP shall notify the N3B Waste Programs Manager/Designee of various container conditions (e.g., FGE) as identified in the previous sections.
- 4.26.10 CCP shall notify N3B of conditions or concerns they have with regard to safety, health, quality assurance, security, operational, or environmental implications.

- 4.27 Occurrence Reporting and Processing System (ORPS) and Price-Anderson Amendments Act (PAAA)
- 4.27.1 CCP, through NWP established programs, maintains the responsibility for reporting potential PAAA issues resulting from the certification and transportation for TRU waste by CCP at LANL. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP at LANL.
- 4.27.2 The Host site maintains the responsibility for reporting potential PAAA issues resulting from issues with the safe operation of CCP activities (e.g., Radiation Safety, IS, IH, FPP, Maintenance, LO/TO, Conduct of Operations, etc.) at LANL. This includes filing any ORPS reports resulting from issues with safe operations of CCP activities at LANL.
- 4.27.3 Both N3B and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operation of characterization or transportation related activities by CCP at LANL.
- 4.27.4 Both N3B and CCP shall invite the other to participate in the investigation of any characterization or transportation activities that result in an ORPS or PAAA report.
- 4.27.5 Both N3B and CCP shall support and participate in investigations when CCP characterization or transportation activities result in an ORPS or PAAA report.
- 4.28 Authorization Basis (AB) and Configuration Management
- 4.28.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved Host site Documented Safety Analysis or Basis of Interim Operations.
- [A] The Host site shall provide to CCP, Host site generated AB documentation concerning CCP related activities and equipment, including USQDs, for CCP's review.

- [B] CCP has primary responsibility to control operations and CCP-provided equipment configurations to ensure compliance with CCP and Host site procedures that protect the personnel, the public, and the environment.
- [C] For CCP provided equipment, CCP will provide the documentation necessary for the Host site to perform the evaluation against its safety analysis. This documentation may include Health and Safety Plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and the Host site.
- [D] For Host site-provided equipment, CCP will review operational and AB documentation, including USQDs, prior to assuming operation of the equipment to ensure the protection of personnel, the public, and the environment.
- [E] All changes to equipment operated by CCP will be controlled by the Host site Work Control Program to ensure appropriate AB evaluations are conducted, and associated controls established.
- [F] The Host site will make available all changes to AB requirements that affect CCP operations to CCP prior to implementation.

4.29 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program*

4.29.1 The requirements of 10 CFR Part 851 are incorporated by N3B-PD103, *Worker Safety and Health Program*. All work performed by CCP at N3B will be in accordance with N3B-PD103.

4.30 Remote-Handled (RH) Waste Stream

4.30.1 Upon implementation of a Remote-Handled (RH) Program, specific roles and responsibilities will be established for personnel under the CCP RH Program.

5.0 RECORDS

- 5.1 Records are generated during the implementation of procedures referenced in this Interface Document. These records are maintained as QA records in accordance with CCP-QP-008. No additional records are generated as a result of this Interface Document.

6.0 OVERSIGHT

NOTE

DOE has delegated the authority to CCP to characterize and certify TRU waste to be shipped to the WIPP. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator on behalf of DOE. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the CH WAC and WAP.
- 6.2 Following successful completion of the CBFO certification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP SPM. The CCP SPM and NWP QA will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any finding or other deficiencies against the CCP scope of work.
 - 6.3.2 Document and perform corrective actions in accordance with applicable NWP issues management procedures.
 - 6.3.3 Provide Host site QA with CCP actions to correct the identified deficiencies.
 - 6.3.4 NWP QA will maintain an information file of the Host site surveillance reports conducted on the CCP scope of work.

Figure 1. CCP-N3B Communications Flow Chart

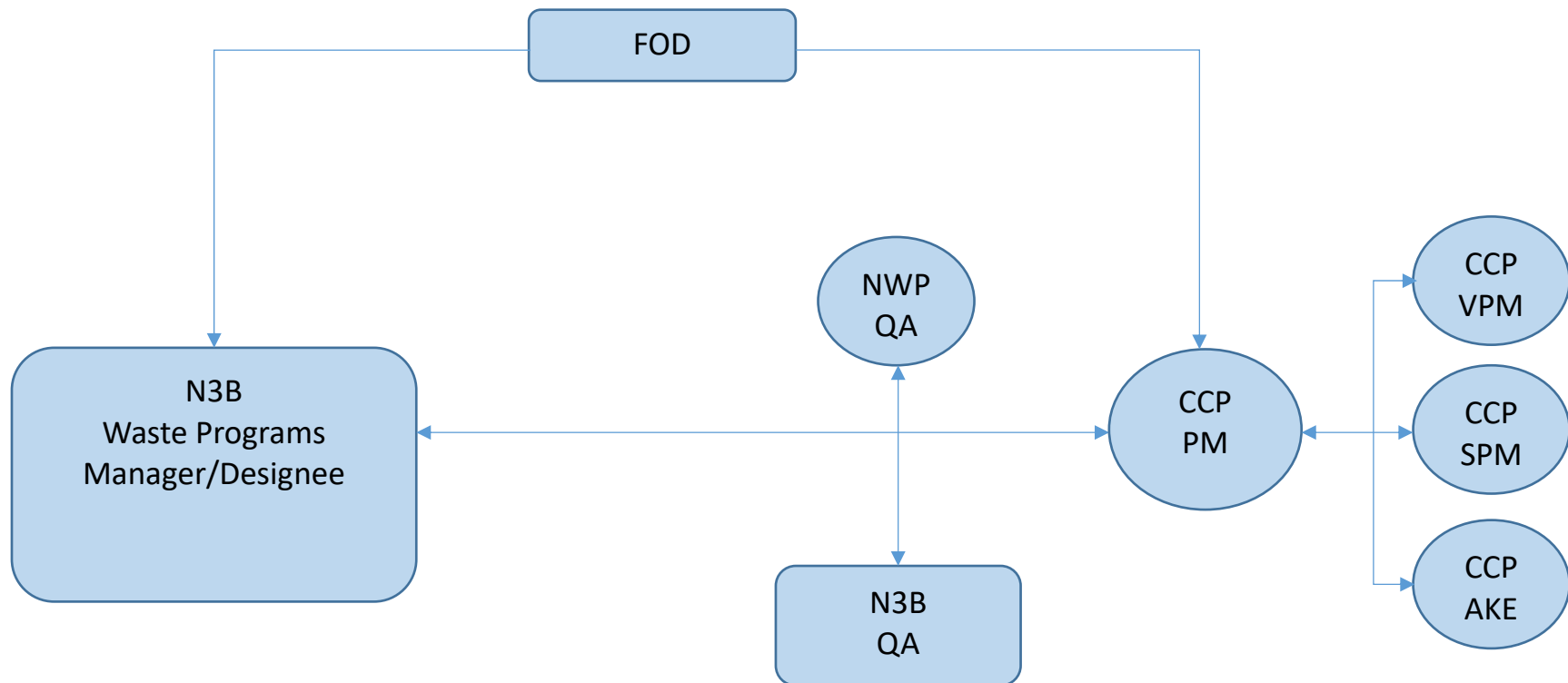


Figure 2. Nuclear Waste Partnership – CCP Organization Chart

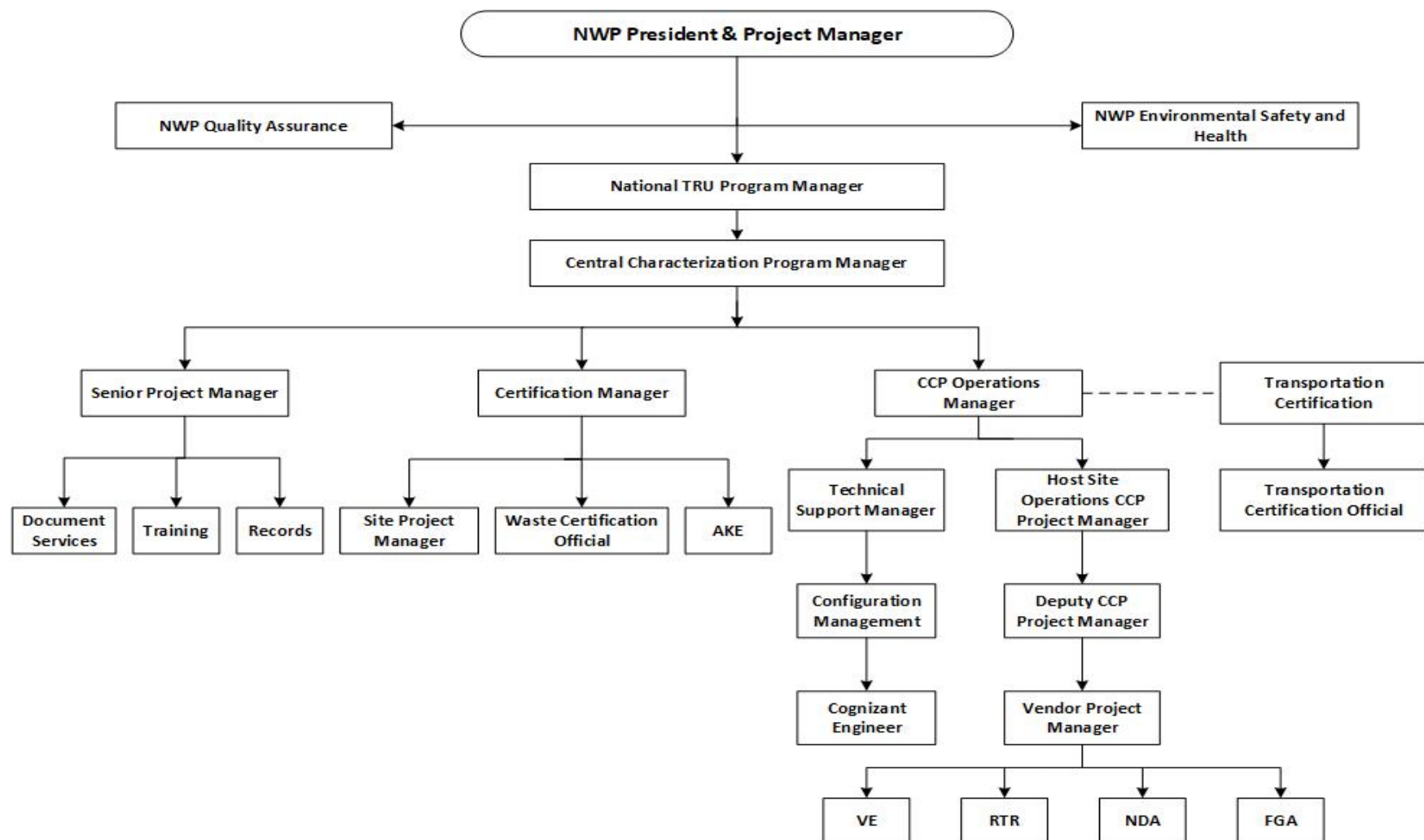
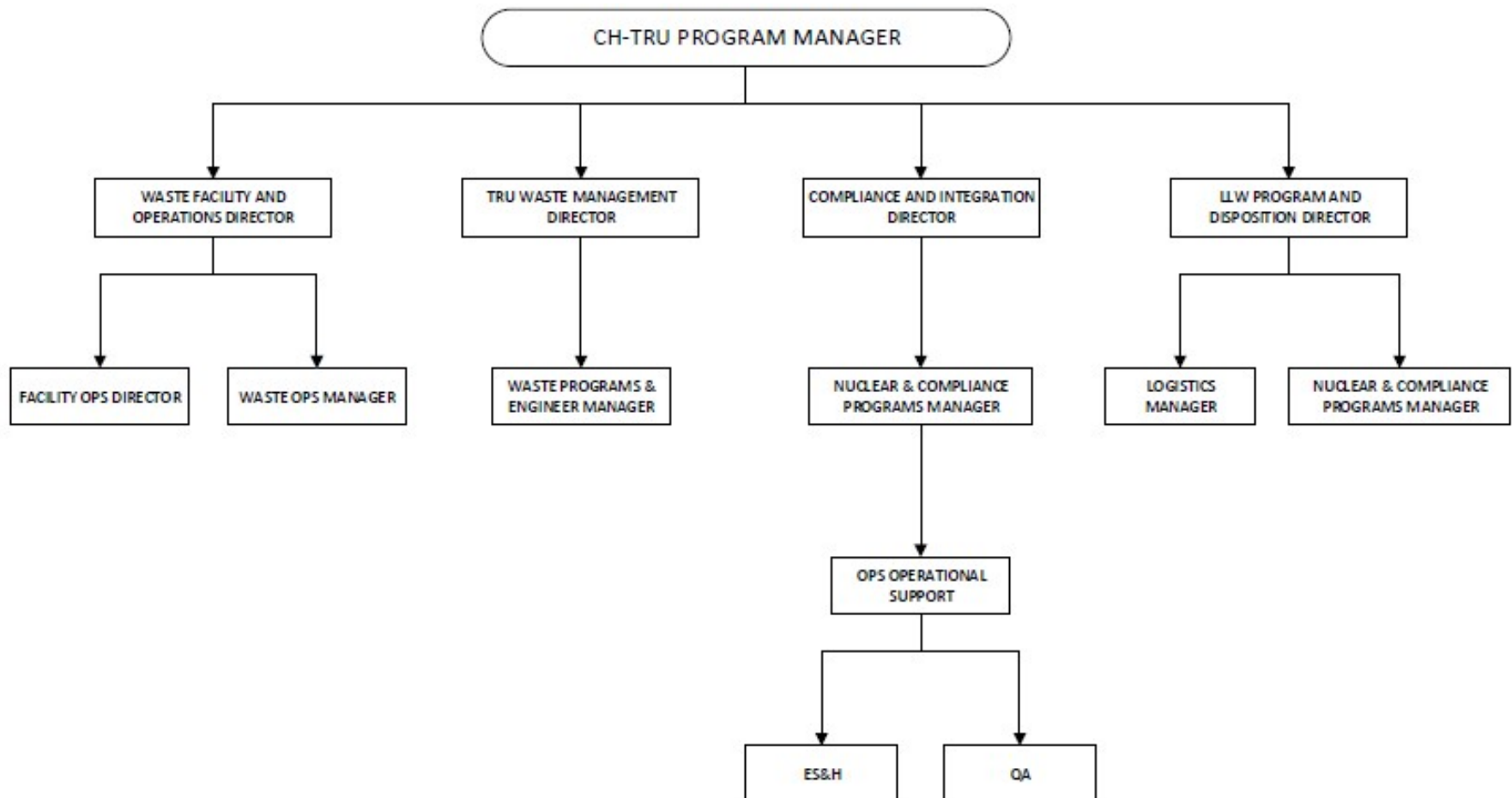


Figure 3. N3B Organization Chart



CCP-PO-012

Revision 17

CCP/Triad National Security LLC at Los Alamos National Laboratory (LANL) Interface Document

EFFECTIVE DATE: 12/18/2019

Richard Kantrowitz

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	10/21/2003	Initial Issue.
1	12/16/2003	Revised the Scope of the document. Updated Section 2.1 References. Updated Section 3.0, steps 3.7 VPM responsibilities and inserted step 3.10 LANL SPQAO responsibilities. Corrected referenced section in step 4.14.4. Updated Figure 1.
2	04/20/2004	Interface Document updated to reflect changes in work scope and joint organizational responsibilities.
3	04/26/2004	Incorporated CBFO Adequacy Review Comment resolutions to Section 1.0 and inserted step 4.17.
4	03/31/2006	Revised to make organizational changes, changes to be consistent with Statement of Work (SOW) clarifications, and changes to reflect coordination details learned during Fiscal Year (FY) 2004. Revised based on the Implementation Plan for CCP Characterization Operations Improvements.
5	11/16/2006	Revised to incorporate controls in the Central Characterization Project (CCP) Basis for Interim Operation (BIO) for the Waste Isolation Pilot Plant (WIPP) Mobile Characterization Units and to provide notifications between the Host site, CCP, and WIPP site. Revised to implement the Waste Isolation Pilot Plant Hazardous Waste Facility Permit requirements resulting from the Section 311/Remote-Handled (RH) Permit Modification Request (PMR).
6	08/06/2007	Revised to clarify Authorization Basis and Configuration Management requirements and editorial changes.
7	05/08/2008	Revised to reflect corrective actions identified during accident investigation and follow-up safety assessments.
8	12/29/2010	Minor revision to update references to the <i>Waste Isolation Pilot Plant Hazardous Waste Facility Permit</i> .
9	01/04/2012	Revised to incorporate box line operating procedures, CCP-TP-059, <i>CCP Operating the Super High Efficiency Neutron Counter (SuperHENC) Using NDA 2000</i> , and CCP-TP-198, <i>CCP HE-RTR Operating Procedure</i> , and make any editorial changes necessary.
10	07/09/2012	Procedure is being revised to correctly describe the process for receiving Central Procurement Project supplied commodities at Los Alamos National Laboratory.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
11	10/01/2012	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes.
12	11/05/2012	In response to CAR-LANL-0003-12, revised to clarify roles associated with providing measuring and testing equipment (M&TE) Certificates of Calibration to Central Characterization Program (CCP).
13	06/25/2013	Incorporate the Gas Generation Testing (GGT) process, In Situ Object Counting Systems (ISOCS) process, and editorial changes. Revised to implement the Permit Modification Request Class 2 approved by New Mexico Environment Department (NMED) dated March 13, 2013.
14	10/30/2013	Incorporate CCP-TP-068, <i>CCP Standardized Container Management</i> for container management and incorporate additional responsibility titles for operations at Technical Area (TA)-55.
15	01/23/2014	Revised to provide the allowance to use either CCP-TP-120, <i>CCP Container Management</i> or CCP-TP-068, <i>CCP Standardized Container Management</i> , for container management.
16	02/26/2016	Revised format and content to better align with standardized Central Characterization Program (CCP) interface document format and to address enhancements pertaining to the Acceptable Knowledge (AK) process, and to realign responsibilities based on Host site reorganization.
17	12/18/2019	Rewrite of procedure to include, but not limited to: Revised content in Section 1.0 to standardized Central Characterization Program (CCP) format. Removed Section 2.3. Editorial changes for grammar and sentence structure. Update Figures to more accurately represent new contractor. Updated responsibilities for Los Alamos National Laboratory (LANL) Responsible Division Leaders (RDLs), clarified reporting requirements for CCP nondestructive assay (NDA) to Host site.

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1.0 PURPOSE

This document establishes the interfaces between the Nuclear Waste Partnership LLC (NWP) Central Characterization Program (CCP) and the Los Alamos National Laboratory (LANL) National Nuclear Security Administration (NNSA) operations contracted through Triad National Security LLC. CCP is operated by NWP at the direction of the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO).

NOTE

Triad National Security LLC hereafter will be referred to as Triad. Triad and "Host site" are used interchangeably throughout this document.

This interface is the mechanism used to delineate the interaction between CCP and Triad and is not intended to be used in lieu of a task-specific subcontract. Specifically, this document identifies CCP and Host site/generator, Triad, responsibilities for implementing requirements and deliverables.

1.1 Background

The LANL is a transuranic (TRU) waste generator site in the DOE complex. The NNSA contractor, Triad National Security LLC, is responsible for the generation and management of waste at various Technical Areas (TAs) throughout the site. The DOE Los Alamos Field Office manages/provides oversight for activities specific to NNSA generated TRU waste.

Through the Performance Management Plan (PMP) of July 2002, DOE CBFO designated the CCP to provide assistance to the waste processing portion of the TRU Program at the LANL site.

1.2 Scope

Triad will provide the infrastructure and associated programs necessary to support all activities described in this Interface Document.

CCP will (a) provide a Waste Isolation Pilot Plant (WIPP)-certified program for the characterization, certification, and shipment of LANL TRU wastes, (b) train and qualify personnel to perform activities under the CCP WIPP-certified program in compliance with DOE Orders relevant to nuclear facilities, (c) provide services, procedures, personnel, and equipment to augment LANL required activities.

This document defines interface requirements between CCP and Triad for the following areas:

- Initial Setup for Operations
- Facilities/equipment for TRU waste characterization, storage, and shipping
- Safety Programs
- Security Clearance process and Human Reliability Program
- Training Qualification
- Routine Operations
- Container Management
- Visual Examination (VE) and Prohibited Item Disposition (PID)
- Real-Time Radiography (RTR)
- Nondestructive Assay (NDA)
- Performance Demonstration Program (PDP)
- Source Control
- Flammable Gas Analysis (FGA)
- Filter Inspection/Filter Change out
- Off-Site Source Recovery Program (OSRP)
- Acceptable Knowledge (AK)
- Project Office Certification Activities
- Transportation
- Deficiencies and Nonconformances
- Measurement and Test Equipment (M&TE)
- Procedures
- Documents/Records
- Procurement
- Oversight
- Configuration Management
- Quality Assurance (QA)
- Price-Anderson Amendments Act (PAAA)
- 10 Code of Federal Regulations (CFR) Part 851, *Worker Safety and Health Program*
- Gas Generation Test (GGT)

These services will be performed with CCP and/or Host site equipment with DOE/CBFO-certified procedures, as applicable. The Host site may augment CCP characterization efforts as requested by CCP. Augmented services provided by the Host site shall comply with applicable CCP procedures.

The Host site/generator services covered by this document include programs for Radiological Controls, Occupational Safety and Health,

Industrial Hygiene, Nuclear Safety/Authorization Basis (AB), Emergency Management, and Environmental/Hazardous Waste Management.

The Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling analysis deemed necessary by the WIPP Co-Permittees [Nuclear Waste Partnership (NWP) and Carlsbad Field Office (CBFO)].

2.0 REQUIREMENTS

All services provided by CCP will comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC), the Waste Isolation Pilot Plant Hazardous Waste Facility Permit-Waste Analysis Plan (WIPP-WAP), and Certificates of Compliance (COC) for Type B Packages issued by the Nuclear Regulatory Commission (NRC) and DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document (QAPD)*.

This document implements the applicable requirements of the following:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-94-1012, *Quality Assurance Program Document*, Carlsbad New Mexico, U.S. DOE Carlsbad Field Office
- WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*
- PD100, *DOE/NNSA Approved Los Alamos National Laboratory 10 CFR 851 Worker Safety and Health Program Description*
- P121, *Radiation Protection*

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization, certification, and transportation activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, nondestructive examination (NDE), which includes RTR, and VE, NDA, FGA for transportation, data validation and verification, waste certification, WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry, and transportation activities. Through the characterization activities performed, CCP provides support to Triad in demonstrating compliance with Policy P409, *LANL Waste Management*, and the *LANL Hazardous Waste Facility Permit*.

The Host site's responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host site/generator documents provided to CCP.

NOTE

Communications paths are depicted on Figure 1, CCP-Triad Communications Flow Chart.

3.1 Operations

3.1.1 CCP performs the following:

- [A] Obtains daily release/approval from Triad First Line Manager (FLM) prior to performing CCP operations.
- [B] Performs system start-up and calibration of characterization equipment.
- [C] Operates CCP equipment in accordance with approved procedures including CCP-PO-005, *CCP Conduct of Operations*.

3.1.2 Triad provides the following to support CCP:

- [A] Radiological controls as needed to support characterization activities, including:
 - Radiological postings.

- Radiation protection surveys, both initial and routine, on characterization equipment and provide an approved survey report to the CCP Vendor Project Manager (VPM).
- Radiological Work Permits (RWPs) to support CCP activities.
- Personnel dosimetry.
- Dose assessments and dosimetry reports.
- Bioassay sample collection, evaluation, and reporting, in accordance with 10 CFR 835.402, *Individual Monitoring*, if applicable. The CCP Project Manager (PM) or CCP VPM will be notified of any positive bioassay results as soon as is reasonably possible.
- Calibrated and source checked survey instrumentation for radiological protection.
- Radiological source controls.
- Radiation dose rate surveys for container certification and shipment.

- [B] Adequate facilities for the safe performance of characterization and transportation activities.
- [C] Site-specific training, as needed, to ensure safe operations.
- [D] Industrial Safety and Health (IS&H) support.
- [E] Fire Protection and Emergency Management support.
- [F] AB oversight, including Unreviewed Safety Question (USQ) evaluations.
- [G] Environmental impact oversight and support.
- [H] On-site container transportation.

- [I] Container handling, inventory control, and storage location tracking.
- [J] Calibrated M&TE for use in characterization or calibration services for CCP provided M&TE.
- [K] Waste packaging materials and other equipment/materials purchased and inspected in accordance with the Qualified Supplier List (QSL) approved program.
- [L] Hazardous waste manifesting, bill of lading, and notifications for transportation.
- [M] Qualified personnel to support maintenance of CCP equipment.
- [N] Response to and resolution for CCP management assessment and CCP QA surveillance findings related to Triad waste management activities.

3.2 CCP Project Manager/Designee (PM)

- 3.2.1 Ensures that waste characterization activities are conducted for Triad per the Interface Document and applicable regulatory documents.
- 3.2.2 Ensures oversight for CCP project safety and compliance is provided.
- 3.2.3 Requests personnel and equipment from the Responsible Division Leader/Designee to support characterization, certification, and transportation, as required.
- 3.2.4 Manages CCP support within agreed to funding and scope.
- 3.2.5 Provides production reports to the DOE/CBFO and Triad's Responsible Division Leader/Designee as scheduled by CBFO.
- 3.2.6 Responds to Facility Operations Director (FOD) and Responsible Division Leader/Designee on findings from Triad oversight activities of CCP operations, as required.
- 3.2.7 Interfaces with DOE/CBFO through the CCP Project Office.

- 3.2.8 Requests special nuclear material sources from Triad's Responsible Division Leader/Designee.
- 3.2.9 Ensures CCP personnel comply with Triad's integrated work management, environmental, safety, and security requirements.
- 3.2.10 Ensures CCP procedures are approved by Host site.
- 3.2.11 Functions as the point of contact (POC) to coordinate CCP reviews of Triad procedures and waste processing plans by appropriate CCP Subject Matter Experts (SMEs).
- 3.2.12 Interfaces with the Waste Characterization and Processing Review Board, when requested.

3.3 CCP Vendor Project Manager (VPM)

- 3.3.1 Obtains Host site management daily release/approval prior to performing CCP operations.
- 3.3.2 Provides primary CCP management oversight for safety and health of CCP personnel supporting Triad.
- 3.3.3 Monitors the List of Qualified Individuals (LOQI) daily to confirm that only qualified personnel perform waste characterization and transportation activities.
- 3.3.4 Supports training and briefing of personnel in regards to procedural changes by scheduling training sessions, as required.
- 3.3.5 Controls access of CCP personnel including its subcontractors to the operational areas. Requests site access for visitors and provide full-time escorts.
- 3.3.6 Functions as CCP's primary interface and point-of-contact between CCP and Triad for characterization activities (operations).
- 3.3.7 Coordinates daily CCP operations, to include subcontractor personnel.
- 3.3.8 Works in conjunction with Responsible Division Leader/Designee to manage the control, movement, and tracking of waste containers through the CCP characterization process.

- 3.3.9 Ensures operability and availability of CCP-provided characterization equipment.
- 3.3.10 Ensures that CCP-operated equipment is maintained under a CCP approved Configuration Management Program.
- 3.3.11 Ensures that new additions to and/or modifications made to CCP-provided facilities and/or equipment are submitted to Responsible Division Leader/Designee as soon as practicable and approvals are received prior to implementation.
- 3.3.12 Ensures applicable manufacturers Safety Data Sheets (SDSs) for products brought to the facility by the CCP are provided to the Operations Center, or other Triad departments as requested by Triad Responsible Division Leader (RDL).
- 3.3.13 Notifies Responsible Division Leader/Designee when CCP personnel invoke STOP work or pause work in the event of a safety concern or suspected environmental impact concern.
- 3.3.14 Coordinates with the Responsible Division Leader/Designee, and CCP Project Manager/Designee for any potential Noncompliance Tracking System-Reportable PAAA issues or any occurrence reports resulting from activities under the CCP Certified Program.
- 3.3.15 Ensures CCP personnel are enrolled in Host site dosimetry program.
- 3.3.16 Performs annual review of CCP personnel enrolled in the Human Reliability Program.
- 3.4 CCP Site Project Manager (SPM)
 - 3.4.1 Functions as CCP's primary interface and point-of-contact between CCP and Triad for certification activities (e.g., data management).
 - 3.4.2 Ensures the AK Summary Reports and container lists for LANL waste streams are prepared, approved, and issued.
 - 3.4.3 Ensures the preparation and approval of waste stream profile forms (WSPFs), as required.

- 3.4.4 Provides evidence to the CCP Project Manager/Designee and Responsible Division Leader/Designee of participation and successful completion of the DOE/CBFO PDP for each NDA operating system.
- 3.4.5 Ensures completion of project level verification and validation of batch data reports (BDRs).
- 3.4.6 Ensures that software used by CCP is controlled in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*. LANL retains ownership and licenses of LANL developed/procured software.
- 3.4.7 Provides Acceptable Knowledge Assessments (AKAs) to the Site Management Representative, hereafter referred to as Responsible Division Leader/Designee, for distribution to SME to verify accuracy and completeness and obtain concurrence signature from the Responsible Division Leader/Designee.
- 3.4.8 Provides Responsible Division Leader/Designee with the final reports of Enhanced AK Assessments and Evaluations, as requested.
- 3.4.9 Coordinates presentation of AK briefings to CCP characterization personnel, POCs, SMEs and cognizant Host site/generator SMEs and Cognizant Personnel (CP).
- 3.4.10 Provides AKE and Responsible Division Leader/Designee quarterly notifications that the Interface Waste Management Document List (IWMDL) are current.
- 3.4.11 Ensures changes in waste information resulting from notifications by Triad are managed in accordance with the CCP certified program.
- 3.4.12 Informs the appropriate CCP Acceptable Knowledge Expert (AKE) of changes in waste information received from Triad AND provides a documented request to Triad if additional information is required to ensure compliance with the CCP certified program.

3.5 CCP Acceptable Knowledge Expert (AKE)

- 3.5.1 Collects, compiles, and reviews AK documentation in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
- 3.5.2 Ensures CCP has obtained necessary container information prior to characterization.
- 3.5.3 Interacts directly with the Responsible Division Leader/Designee to ensure accurate, sufficient, and up-to-date waste characterization information is provided.
- 3.5.4 Works in conjunction with Responsible Division Leader/Designee to develop an IWMDL for each waste stream.
- 3.5.5 Works with cognizant Host site/generator personnel to resolve comments and questions.
- 3.5.6 Submits IWMDL and associated quarterly Responsible Division Leader/Designee notification to the Site Project Manager (SPM) to submit to records.
- 3.5.7 Performs an AKA for each waste stream.

3.6 NWP QA Engineer/Designee

- 3.6.1 Reports to the NWP QA Programs Manager to maintain functional authority and independence from cost and schedule considerations.
- 3.6.2 Functions as CCP's primary interface and point-of-contact for QA issues between the CCP and Triad.
- 3.6.3 Validates Nonconformance Reports (NCRs).
- 3.6.4 Provides semi-annual trending summary reports to the CCP SPM.
- 3.6.5 Ensures surveillances of waste characterization activities for Triad are performed on a periodic basis and surveillance reports are provided to the CCP SPM, the CCP Project Manager/Designee, and the Responsible Division Leader/Designee.
- 3.6.6 Performs receipt inspection of procured items in accordance with CCP and Host site requirements.

3.6.7 Provides assistance in generation, disposition, and closure of NCRs and WIPP Forms.

3.6.8 Coordinates with the CCP Project Manager/Designee for any potential Noncompliance Tracking System-Reportable PAAA issues or any occurrence reports resulting from activities under the CCP Certified Program.

3.7 CCP Waste Certification Official (WCO)

3.7.1 Obtains approved WSPF for containers to be certified.

3.7.2 Documents and certifies that all TRU waste payload containers meet the requirements of the Waste Acceptance Criteria (WAC), and submit the data to the WWIS/WDS for approval.

3.8 CCP Transportation Certification Official (TCO)

3.8.1 Ensures CCP Transportation personnel are trained and qualified to perform WIPP-compliant contact-handled (CH) TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current LOQL.

3.8.2 Provides oversight of CCP Transportation personnel for payload and Overpack assembly and loading.

3.8.3 Builds payloads from certified containers and Overpacks provided by Waste Certification Officials (WCOs) in WWIS/WDS.

3.8.4 Certifies payloads for transportation to and disposal at WIPP.

3.8.5 Builds shipments from approval payloads in WWIS/WDS.

3.9 Triad Responsible Division Leader/Designee

3.9.1 Functions as primary POC for Triad with CCP Project Manager for all activities performed by or for CCP (characterization and transportation) in support of NNSA at LANL.

- 3.9.2 Maintains responsibility for activities related to TRU waste generation, packaging, characterization and/or shipping in Chemistry and Metallurgy Research (CMR) Facility, Plutonium Facility (PF), TRU Waste Facility (TWF), Radioactive Assay Nondestructive Testing (RANT) facility, Radiological Laboratory Utility Office Building (RULOB).
- 3.9.3 Formally designates equipment and Triad personnel responsible for performing key responsibilities and communicates Designees to CCP Project Manager.
- 3.9.4 Ensures cognizant Host facility and generator POCs/SMEs are identified and available as necessary to support the review of CCP documents.
- 3.9.5 Functions as the POC with CCP Project Manager for coordination and review and approval of documents required for enhanced AK process, as required.
- 3.9.6 Coordinates review, provides comments, and approves comment resolution on documents listed in Section 4.21.5. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
- 3.9.7 Ensures CCP procedures, equipment, and facilities undergo Host site review and Unreviewed Safety Question Determination (USQD) as required.
- 3.9.8 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
- 3.9.9 Ensures needed site support, such as radiological control and safety, Industrial Safety (IS), Industrial Hygiene (IH), Fire Protection Program (FPP), and Lockout/Tagout (LO/TO), Facility Service Requests (FSRs), work control, Source Custodian, and waste handling resources are available for CCP activities.
- 3.9.10 Ensures documentation of completed Host site-specific training is provided to CCP VPM.

- 3.9.11 Participates in Readiness Assessments or surveillances, as required.
- 3.9.12 Ensures Triad participation on CBFO scheduled LANL site status calls.
- 3.9.13 Makes special nuclear material sources available to CCP and provides support to maintain nuclear material source control in accordance with Triad requirements.
- 3.9.14 Designates Triad Cognizant Host site/Generator Personnel (CP) to interact with the CCP Acceptable Knowledge Expert (AKE) and assist the AKE with AK collection of required documents and information.
- 3.9.15 Ensures periodic surveillances of CCP operations by the Host site are conducted and reported to the CCP Project Manager/Designee.
- 3.9.16 Notifies the SPM and AKE in writing of any new or revised waste management activities that would necessitate a change to the IWMDL.
- 3.9.17 Provides documented information to the CCP SPM/Designee on any modification to container or contents of container (to include overpacking) after the AK has been completed by CCP.
- 3.9.18 Sends Triad procedures and waste processing plans that can impact the CCP characterization process as well as the applicable waste acceptance to CCP AKE and SPM.
- 3.9.19 Provides documentation of surveillances and audits, applicable to CCP, to the CCP Project Manager/Designee.
- 3.9.20 Ensures that CCP is notified prior to approval and implementation of new and/or modification to documents or equipment for work performed in support of TRU waste activities.
- 3.9.21 Ensures configuration managements of Triad-owned equipment is maintained.
 - [A] Ensures that adequate information is provided to CCP on Triad-owned equipment prior to acceptance and turnover of equipment to CCP.

3.9.22 Ensures a formal communication process is implemented to identify and communicate to CCP any changes in waste information pertinent to TRU waste containers including generation of new containers, repackaging of existing containers, container type changes, changes in closure dates, filter change information, waste stream ID/ waste stream profile changes, EPA hazardous waste number (HWN) assignment.

3.9.23 Ensures a process is implemented to prevent the assignment of HWNs to transportation overpacks that have not been applied to the certified inner waste containers.

3.10 Triad Facilities Operations Director (FOD)/Designee

3.10.1 Ensures CCP/Triad personnel comply with Triad integrated work management, environmental, safety, and security requirements through document reviews and emergency drills.

3.10.2 Ensures new CCP activities follow the Triad readiness review requirements.

3.10.3 Ensures Technical Safety Requirements (TSR) surveillances are conducted as required.

3.10.4 Ensures Fire Protection and other facility surveillances, are performed when required.

3.10.5 Releases approved CCP Integrated Work Documents (IWDs).

3.11 Triad First Line Manager

3.11.1 Triad will provide line management authority to Triad personnel to ensure CCP operations are adequately conducted to support the Triad mission.

[A] Responsible for the day-to-day assignment of a sufficient number of qualified Triad personnel to augment operations under CCP procedures to meet commitments.

[B] Provides work authorization and release in accordance with Triad policies and procedures for CCP operations.

[C] Acts as the direct line of communication to Triad support organizations and services in support of CCP operations.

3.12 Triad Institutional Quality & Performance Assurance (IQPA) Division
Leader/Designee

3.12.1 Reports to Institutional Quality & Performance Assurance (IQPA)
Division Leader to maintain functional authority and independence
from cost and scheduled considerations.

3.12.2 Functions as Triad's primary interface and point-of-contact for QA
issues between Triad and CCP.

3.12.3 Provides copies of documentation of assessment activities
(including audits and surveillances) to the CCP Project
Manager/Designee.

3.12.4 Provides oversight of activities performed in support of this
interface agreement using Triad programs and procedures.

3.13 Triad Environment, Safety, and Health (ES&H) Support

3.13.1 Provides workplace monitoring, as applicable to the hazards
associated with the work and workplace.

3.13.2 Provides safety and health compliance reviews, reviews and
approves IWDs, and assures compliance with the Triad safety and
health requirements applicable to the CCP operations for Triad.

3.13.3 Ensures compliance with the Triad Hazardous Waste Facility
permit, and all other environmental compliance requirements.

3.13.4 Ensures compliance with Environmental Protection & Compliance
Division requirements and provides support for environmental
compliance reviews and audits when requested by Triad
Responsible Division Leader/Designee.

3.14 Triad Environmental Protection & Compliance (EPC) Division
Leader/Designee

3.14.1 Provides oversight to ensure that Triad waste is compliantly
characterized, managed, stored, and treated.

3.14.2 Ensures compliance with P409, *LANL Waste Management*, P409-
1, *LANL Waste Acceptance Criteria*, and *LANL Hazardous Waste
Facility Permit*.

3.14.3 Provides documentation of assessments and surveillances, as applicable, to the CCP Project Manager/Designee.

3.14.4 Provides review of waste characterization, including acceptable knowledge documentation, as requested by Triad Responsible Division Leader/Designee.

3.14.5 Sponsors official visitors with badges and access permissions, when requested.

3.15 Triad Nuclear Engineering and Nonproliferation Responsible Division Leader/Designee

3.15.1 Functions as primary POC for Off-Site Source Recovery Program (OSRP) with CCP Project Manager.

3.15.2 Ensures CCP procedures for OSRP operations undergo Host site review and Unreviewed Safety Question Determination (USQD) as required.

3.15.3 Provides documentation of assessments and surveillances, as applicable, to the CCP Project Manager/Designee.

4.0 INTERFACE

4.1 Initial Setup for Operations

4.1.1 The initial setup and startup of CCP characterization operations have been completed. In addition, the initial certification audit is complete and operations have commenced.

4.1.2 Triad will provide infrastructure support as additional pieces of equipment or operations are added to the Triad scope.

4.2 Routine Operations

NOTE

Working shifts will be established by the CCP VPM and approved by the Responsible Division Leader/Designee prior to implementation.

4.2.1 Triad has the overall responsibility for the management of the nuclear materials and operations of the nuclear facilities.

4.2.2 Work performed by CCP personnel (including subcontractors) will be in compliance with Triad and CCP requirements.

4.2.3 CCP personnel will STOP WORK (or Pause), as appropriate and will notify the CCP VPM in the event of a safety concern or suspected environmental impact concern.

4.3 Work Standards

4.3.1 CCP VPM or Designee will perform the following activities to support daily operations:

[A] Ensure that work is performed in accordance with Triad requirements (e.g., LO/TO, Work Control, IWD) by trained and qualified personnel in accordance with approved work documents.

[B] Support an investigation when an abnormal condition or occurrence is identified, as required.

[C] Disposition NCRs and WIPP Forms as required, and communicate progress to the CCP Project Manager/Designee and Responsible Division Leader/Designee.

- [D] Ensure notifications are made to CCP Project Manager and Triad Responsible Division Leader/Designee when assay results exceed facility limits for criticality spacing and/or AB limits as specified in subsection Nondestructive Assay.
- [E] Ensure that equipment calibration is performed on CCP operated equipment, in accordance with Section 4.20.
- [F] Attend pre-operations briefings performed for all on-site waste characterization personnel and attend the Triad Plan of the Day/Week briefings, as appropriate.
- [G] Ensure the safe operation and maintenance of equipment by CCP personnel by performing periodic oversight.
- [H] Prior to introducing new chemicals into the facility, provide a copy of SDSs to the FOD, Operations Center, the CCP Project Manager/Designee, Responsible Division Leader/Designee, and others as appropriate, to ensure that the Chemical Inventory requirements are maintained.

4.3.2 Responsible Division Leader/Designee will ensure the following radiological control support is provided for CCP activities:

- [A] Maintain radiological postings.
- [B] Perform an initial and periodic radiation protection surveys on NDA and RTR equipment and provide an approved survey report to the NDA Team Leader or RTR Team Leader, and the VPM.
- [C] Perform radiation protection surveys and monitoring as necessary.
- [D] Provide thermoluminescent dosimeters (TLDs) for CCP personnel.
- [E] Provide calibrated and source checked survey instrumentation as required.
- [F] Issue and/or modify Radiation Work Permits (RWPs) to support CCP activities as needed.

4.3.3 CCP personnel will perform the following activities in support of CCP Operations.

- [A] Follow site requirements for LO/TO.
- [B] Perform work in accordance with CCP-approved procedures for waste characterization and certification activities and Triad-approved work packages and procedures for non-waste characterization activities (e.g., equipment repairs).
- [C] Operate in accordance with CCP-PO-005, *CCP Conduct of Operations*.
- [D] Develop IWDs or other applicable documents, with assistance from Triad Environment, Safety and Health (ES&H) and Environmental Protection & Compliance (EPC) personnel, for all CCP activities performed for Triad in accordance with Triad policies and submit to the Responsible Division Leader/Designee for approval.

4.4 Training

- 4.4.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.4.2 CCP and Host site personnel assigned to field operations must complete the Host site-specific training. The Responsible Division Leader/Designee will ensure the Host site-specific training documentation is provided to CCP Training.
- 4.4.3 Both the CCP training and Host site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.4.4 Administrative work, such as BDR reviews requiring no access to the characterization equipment or processes at the Host site, may be completed by personnel who have not completed the required Host site-specific training. Personnel who have not completed Host site-specific training will not be allowed unescorted access to the characterization equipment.

4.4.5 A LOQI will be monitored daily by the CCP VPM to confirm CCP personnel and Host site personnel assigned to CCP are qualified.

4.5 Employee Monitoring

4.5.1 CCP will participate in the Triad radiological monitoring program as required by the radiological work permit process governing work performed.

4.5.2 The CCP Project Manager or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of material/waste may have occurred or if CCP personnel are required to resubmit bioassay samples as soon as is reasonably possible.

4.5.3 Triad Radiation Protection personnel will perform routine surveys and monitoring for contamination and radiation as specified in LANL policies or procedures. The CCP Project Manager/Designee or CCP VPM and appropriate Triad management personnel will be notified immediately upon the discovery of any loose surface contamination on any CCP-operated characterization equipment. Access to copies of routine survey results will be made available to CCP upon request.

4.5.4 Triad will provide the CCP Project Manager/Designee with the results of continuous or fixed air sample filter analysis as soon as the analysis is complete for any monitored area routinely occupied by CCP personnel, as requested.

4.6 Security Clearances and Human Reliability Program

4.6.1 Responsible Division Leader/Designee will sponsor CCP personnel that require L or Q clearances for work in TA55 or Chemistry and Metallurgy Research (CMR) facilities.

4.6.2 CCP VPM will enroll, maintain, and perform annual review for CCP personnel that require enrollment in the Triad Human Reliability Program.

4.7 Acceptable Knowledge (AK)

4.7.1 CCP records personnel in Carlsbad will maintain the auditable AK record necessary to support the AK Summary Report in

accordance with CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, and CCP-QP-008, *CCP Records Management*.

4.7.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005.

- [A] Host site/generator personnel assist CCP AK personnel with AK collection.
- [B] CCP AK personnel and Host site/generator personnel will cooperate fully with each other in the sharing and exchange of any and all AK information that is collected for or incorporated into IWMDL or AK Summary Reports.
- [C] The Responsible Division Leader/Designee will provide assistance by coordinating potential interviewees for CCP. The Responsible Division Leader/Designee will ensure Host site/Generator Personnel (CP) are available to serve as an intermediary and an active listener to support effective generator questioning.

4.7.3 CCP AK personnel and Host site/generator personnel develop an IWMDL that includes facility processes, plans, and procedures, waste profile forms, and Waste Compliance and Tracking System records that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

4.7.4 The AKE develops the new or revised IWMDL in accordance with CCP-TP-005 using the existing body of AK documentation.

- [A] The Responsible Division Leader/Designee ensures CP are assigned to review the new or revised IWMDL for accuracy and completeness and provide written comments as appropriate.
- [B] The AKE and CP resolve comments and questions.
- [C] CCP posts the new revised IWMDL on the CCP secure file transfer protocol (sftp) site.

NOTE

This note applies to step 4.7.5. The activities of step 4.7.5 may be initiated as necessary by the AKE for existing waste streams, new waste streams, or during AK revisions/updates.

4.7.5 AKAs are performed in accordance with CCP-TP-005.

- [A] SPM provides Responsible Division Leader/Designee with the AKA results.
- [B] Responsible Division Leader/Designee distributes results of the AKA to designated CPs for review and comment.
- [C] AKE resolves comments with Responsible Division Leader/Designee and CPs.
- [D] Responsible Division Leader/Designee concurs with final AKA in writing.

4.7.6 CCP submits new or revised AK Summary Reports to the Responsible Division Leader/Designee for review and concurrence.

- [A] The Responsible Division Leader/Designee ensures CP review the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.

4.7.7 All Host site/generator CPs attend CCP briefings on new or revised AK Summary Reports.

- 4.7.8 Responsible Division Leader/Designee notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to the IWMDL.
- 4.7.9 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AK Summary Report is needed.
- 4.7.10 The Host site will not provide any waste container to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repack the container.
- [A] The work document(s) provided to the AKE will contain the following information at a minimum:
- Identification (including revision) of the work document(s) used to generate the container
 - Type of activity (e.g., packaging/repackaging only, remediation, treatment)
 - Amount (estimated) and type (if known) of liquids
 - Type and quantity (estimated) of absorbents used
 - Type and quantity (estimated) of neutralization agents used
 - Any unexpected conditions or reactions encountered
 - General description of waste items
 - Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
 - Filter data including model and quantity used
 - Parent container identification

4.7.11 The AKE will ensure they have obtained and reviewed the correct version of IWMDL documentation used to generate/manage a container before adding it to the AK Tracking Spread Sheet.

4.7.12 At a minimum of once per calendar quarter, Responsible Division Leader/Designee will review the current IWMDL and provide written assurance to the CCP SPM that the list is up to date **OR** provide necessary documentation to revise the list.

4.8 Container Management

NOTE

Containers may have CCP-TP-120, *CCP Container Management*, traveler. When presented for characterization a CCP-TP-068 traveler will be applied and completed. CCP-TP-120 was replaced by CCP-TP-068 as the CCP standardized procedure for Container Management.

4.8.1 Triad will provide waste to the characterization equipment, depending upon certification and characterization capabilities. All CH containers delivered for characterization will be approved by the CCP VPM as prescribed in CCP-TP-068, *CCP Standardized Container Management*.

4.8.2 Responsible Division Leader/Designee is responsible for providing documented information to the CCP SPM/Designee on any modification to the container (to include overpacking) or contents of the container after the AK has been completed by CCP.

4.8.3 The CCP SPM/Designee will review the documented information for modified containers and will notify the Responsible Division Leader/Designee when the containers are approved for entrance into the characterization process.

4.8.4 Triad is responsible for movement of containers and implementing vehicle access controls, from characterization through shipment, including control of containers requiring remediation (prohibited items).

[A] Triad and CCP will perform site container management in accordance with the applicable Triad and CCP procedures. This includes verification that the containers are included in the AK Tracking Spreadsheet for characterization by CCP and ensuring that the Triad operating record is kept up to date with container movements by Triad.

- 4.8.5 CCP is responsible for administratively tracking the containers throughout the CCP characterization processes. Personnel will perform container management in accordance with CCP-TP-068.
- 4.8.6 Triad will provide the necessary dose rate and surface contamination information to CCP to certify the containers for disposal (e.g., survey results). All containers will have a Health Physics Materials Survey tag attached to the container prior to movement to CCP for characterization.
- 4.8.7 If a nonconformance is identified with a container, during the characterization or certification process, the container will be controlled in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
- 4.9 Visual Examination (VE), Repackaging, and Prohibited Item Disposition (PID)
 - 4.9.1 Glovebox operations will have oversight by CCP qualified VE Personnel, as required.
 - 4.9.2 PID will be conducted on containers in accordance with approved Host site procedures with oversight by CCP VE trained personnel, as required.
- 4.10 Filter Inspection/Filter Change out
 - 4.10.1 Triad/CCP personnel will inspect the filters on containers as part of the container acceptance and will document whether the filter is a WIPP-approved filter. This information will be transmitted to the CCP VPM.
 - 4.10.2 If filter change out is performed on containers that do not require repackaging, the operation will be documented and the information transmitted to the CCP VPM.
 - 4.10.3 Triad/CCP personnel also inspect and verify filter models on containers as part of the FGA sampling process.
- 4.11 Real-Time Radiography (RTR)
 - 4.11.1 Containers found with prohibited items or conditions requiring remediation (e.g., unvented container liner, liquids not meeting permit requirements) will be flagged, an NCR initiated, and staged for remediation at a later date.

- [A] RTR Operators will notify the Responsible Division Leader/Designee if containers are found to contain compressed gas cylinders.

4.11.2 If a container is found during RTR that is suspected to contain a classified shape, it will be segregated and handled in accordance with Triad procedures.

- [A] The information generated during the RTR of the container will be subject to control of potentially classified information. This audio/video media will be retained by Triad in accordance with Host site classified information requirements when deemed necessary.

4.11.3 CCP RTR Operators may provide additional interpretation of scans to support other Triad repackaging activities and waste characterization/re-characterizations determined by Triad and agreed to by the CCP Project Manager/Designee.

4.12 Nondestructive Assay (NDA)

4.12.1 **IF** assay results are greater than facility AB limits for PE-Ci, **THEN** CCP personnel will immediately notify the the CCP Project Manager/Designee, the CCP VPM, and the Triad Responsible Division Leader/Designee.

4.12.2 **IF** assay results are greater than the following criticality spacing limitations, **THEN** CCP personnel will notify the Triad Responsible Division Leader/Designee, the CCP Project Manager/Designee and the CCP VPM.

- [A] Individual 55-gallon drums or POC of waste exceeding 200 FGE (Fissile Gram Equivalent) (measured value).
- [B] Containers found to exceed the calibration range of the NDA machine.
- [C] Individual standard waste boxes (SWBs), ten-drum over packs (TDOPs), or standard large box 2 (SLB2s) of waste exceeding 325 FGE (measured value).
- [D] Criticality Control Overpacks (CCO) of waste exceeding 380 FGE (measured value).

4.12.3 If assay results indicate that a container exceeds the WAC limits for plutonium equivalent activity, criteria, CCP personnel will issue an NCR in accordance with CCP-QP-005.

4.12.4 For any containers that exceed the shipping limit for FGE, an NCR will be generated in accordance with CCP-QP-005 to return the containers to Triad for repackaging.

4.12.5 For any containers that are less than 100 nCi/g, an NCR will be generated in accordance with CCP-QP-005 to return the containers to Triad.

4.12.6 Triad will provide/refill the cylinder required for the liquid nitrogen for NDA.

4.13 Source Control

4.13.1 Triad will be responsible for NDA sources used for both calibration (reference sources) and for the DOE/CBFO PDP. Responsibilities include inventory control, storage, inspection and handling. Responsibilities include ensuring radiological control support associated with sources is provided, maintaining the Radioactive Materials Area (RMA) postings and periodic surveys, and performing a semi-annual leak check on the reference sources.

4.13.2 Triad will provide support for the participation in the NDA PDP. This support includes training PDP coordinators, preparation of the test matrix containers, delivery of the containers to the NDA equipment, and responsibility for PDP source control. Triad support will be coordinated by the Responsible Division Leader/Designee.

4.13.3 Triad, as custodian of the sources, will provide to CCP the necessary reference sources for calibration in accordance with CCP NDA calibration procedures.

4.14 Gas Generation Testing (GGT)

4.14.1 CCP will perform GGT sampling and analysis using GGT canisters in accordance with CCP-TP-083, *CCP Gas Generation Testing*, and CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*.

4.15 Flammable Gas Analysis (FGA)

4.15.1 The Responsible Division Leader/Designee, the CCP Project Manager/Designee and the CCP VPM will be notified if after completion of the analysis, the containers exceed the facility designated limits.

4.15.2 FGA personnel will notify the CCP VPM, the CCP PM and the Triad Responsible Division Leader when containers exceed the following:

- 7,000 ppm flammable volatile organic compounds (VOCs)
- 6.4% Hydrogen
- 1.6% Methane

4.16 Off-Site Source Recovery Program

4.16.1 OSRP VE and Radiological Characterization will be conducted using certified equipment with personnel trained under the CCP Certified Program.

4.16.2 The OSRP uses a separate procedure for VE and packaging. In addition, it uses AK documentation in combination with calculations, in lieu of NDA.

4.16.3 Prior data for Off-Site Source Recovery (OSR) containers generated under the LANL Certified Program will be evaluated for acceptability into the CCP Certified Program.

[A] The previous BDRs will be reviewed and validated at the CCP Project Office prior to acceptance into the program.

[B] If the data validators at the CCP Project Office are unable to verify the data, the BDRs will not be accepted and will require re-generation under the CCP program.

4.17 Waste Sampling and Analysis Methods

4.17.1 If the WIPP Permittees determine that additional characterization is necessary using chemical sampling and analysis, the Permittees shall direct generator/storage site to provide the Permittees with the following documentation:

- Sampling and analysis plan

- U.S. Environmental Protection Agency (EPA) SW-846 test method(s), or functionally equivalent test method(s), to be used
- Identification of the laboratory(ies) that will be performing the test(s)

4.17.2 Upon the Permittees written approval of the sampling and analysis plan, the generator/storage site shall implement the sampling and analysis plan.

4.18 CCP Project Office Certification Activities

4.18.1 CCP Project Office certification activities consist of project-level review of BDRs, lot evaluations, data validation, and WIPP WWIS/WDS data entry.

4.18.2 Data validators are responsible for completing the required checklists, resolving comments, and ensuring records are complete.

4.18.3 WWIS/WDS personnel will ensure information is entered into WWIS in accordance with CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*.

4.18.4 The WCO will certify and transmit characterization and certification data using the WWIS/WDS and approved procedures.

4.18.5 The WCO will document and certify that all TRU waste payload containers prepared from the certified process for WIPP meet all of the requirements of DOE/WIPP-02-3214, CCP-PO-001, CCP-PO-002, *CCP Transuranic Waste Certification Plan*, and CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*.

4.18.6 The WCO will provide the Transportation Certification Official (TCO) with all certification information necessary to certify the payload for transportation.

4.19 Transportation to WIPP

4.19.1 Transportation certification and preparation of the shipment of certified packages (e.g., Transuranic Package Transporter-II [TRUPACT-II], TRUPACT-III, or HALFPACT) will be conducted using personnel trained under the CCP Certified Program.

4.19.2 CCP will provide TRUPACT-II, HALFPACT, CH loading training to Triad employees, as required, to maintain certifications required for transportation activities.

4.19.3 Triad will provide manifesting, marking, labeling and placarding of the shipments in accordance with Title 40 CFR, *Protection of Environment*, Title 49 CFR, *Transportation* requirements, and site-specific procedures.

4.19.4 Triad will verify and ensure that containers being shipped to Radioassay and Nondestructive Testing (RANT) or the loading area do not exceed AB Material at Risk (MAR) inventory.

4.19.5 Triad will track MAR inventory at RANT onsite, RANT facility, or other loadout facility.

4.19.6 The TCO will inspect the containers and verify that the filter installed on the containers to be shipped meet WIPP requirements and match information submitted during waste certification.

4.19.7 Waste will be loaded and prepared for transport to WIPP in accordance with CCP-approved procedures.

4.19.8 The TCO will provide documentation to the Responsible Division Leader/Designee responsible for certifying the waste for shipment in accordance with CCP procedures.

4.20 Measurement and Test Equipment (M&TE)

4.20.1 The CCP M&TE Custodian will provide recall notification for CCP M&TE that requires calibration to the CCP Project Manager/Designee. M&TE requiring calibration will include such things as weight scales, individual weights, infrared thermometers, temperature data-loggers, electronic calibrators, digital readouts, torque wrenches, and pressure transducers.

4.20.2 Triad will provide National Institute of Science and Technology - traceable calibration services for specified M&TE. Triad will maintain records on M&TE calibration in accordance with its QSL-accepted program. Triad will provide copies of the Certificates of Calibration for these items of M&TE to the CCP VPM prior to issuing M&TE to CCP for use.

4.20.3 Triad will notify the CCP when M&TE are added, deleted, found out-of-tolerance/defective or failed calibration by the Host site.

4.21 Procedures

4.21.1 The Responsible Division Leader/Designee will send Triad procedures and waste processing plans that can impact the CCP characterization process as well as requirements specified in WIPP-WAC; *Contact-Handled Transuranic Waste Authorized Methods for Payload Control (CH-TRAMPAC)*; WIPP-WAP, to the CCP Project Manager/Designee for review by appropriate CCP SMEs.

[A] As warranted, the CCP Project Manager/Designee will provide written comments from the CCP review of Triad documents to the Responsible Division Leader/Designee for resolution.

[B] Responsible Division Leader/Designee will confirm with the CCP Project Manager/Designee that CCP written comments are resolved and that CCP approves the document prior to proceeding with operations under the scope of the document being reviewed.

[C] Triad, at its discretion, may request objective evidence to support the competency of NWP reviewers.

4.21.2 Editorial or minor changes may be made without the same level of review and approval as the original document as defined in CCP-QP-010, however, USQ review is still required prior to reissue.

4.21.3 New Technical Operating Procedures (procedures that operate equipment) developed by CCP scheduled to be used at the Host site, shall be evaluated by the Host site Responsible Division Leader/Designee to determine if the procedure shall be added to the Host site review lists defined in step 4.21.5.

4.21.4 All characterization procedures, which physically manipulate the waste (e.g., VE) or the waste container (e.g., RTR or NDA) and all revisions to these procedures, will be provided to the Responsible Division Leader/Designee, by the CCP Project Manager/Designee for review (e.g., USQD, AK evaluation, Health & Safety Review and Implementation), before approval by DOE/CBFO and implementation by CCP.

4.21.5 The Responsible Division Leader/Designee will designate the appropriate reviews of the documents listed below (which do not meet the criteria of step 4.21.2 and do not affect the AB) and forward written comments to CCP Document Control in accordance with CCP-QP-010 for resolution. For operational procedures that CCP is not currently operating to, the Responsible Division Leader/Designee may waive the review until CCP operations commence on site. When CCP operations return to the site, the Responsible Division Leader/Designee will be provided all procedures listed below for review.

CCP Documents:

- CCP LANL AK Summary Reports
- CCP LANL WSPFs
- CCP Interface Waste Management Document Lists
- CCP AKA
- CCP-CM-003, *CCP High Efficiency Neutron Counter (HENC-01) (Equipment #NDA-HENC-01) Equipment Description*
- CCP-CM-005, *CCP High-Efficiency Neutron Counter (HENC) (Equipment #NDA-HENC-03) Equipment Description*
- CCP-CM-028, *CCP Real-Time Radiography LANL Unit #1 (Equipment #LANL-RTR-01) Equipment Description*
- CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*

- CCP-TP-059, *CCP Operating the Super High Efficiency Neutron Counter (SHENC) Using NDA 2000*
- CCP-TP-063, *CCP Operating the High Efficiency Neutron Counter Using NDA 2000*
- CCP-TP-064, *CCP Calibrating the High Efficiency Neutron Counter and the Super High Efficiency Neutron Counter Using NDA 2000*
- CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-069, *CCP Sealed Source Visual Examination, Packaging, and Data Validation*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-077, *CCP Calibrating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-082, *CCP Waste Container Filter Vent Maintenance and Operation*
- CCP-TP-083, *CCP Gas Generation Testing*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-101, *CCP Off-Site Source Recovery Program Sealed Source Radiological Characterization and Data Validation*
- CCP-TP-103, *CCP Data Reviewing, Validating, and Reporting Procedure for the NDA Counters at LANL Using NDA 2000*
- CCP-TP-107, *CCP Operating the High Efficiency Neutron Counter #3 (HENC #3) Using NDA 2000*

- CCP-TP-108, *CCP Calibrating the High Efficiency Neutron Counter #3 (HENC #3) Using NDA 2000*
- CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*
- CCP-TP-121, *CCP RTR #1 Operating Procedure*

NOTE

This note applies to step 4.21.6. Examples of cognizant personnel may include, but is not limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
- Chemical and physical characteristics of waste streams
- Chemical compatibilities
- Radiological properties of waste streams
- Treatment permits
- Nuclear Safety
- Environmental compliance
- Facility operations

4.21.6 Upon receipt of a document listed in step 4.21.5, the Responsible Division Leader/Designee will ensure the document is reviewed by cognizant personnel responsible for the waste management activities relevant to the scope of the document.

4.21.7 The Responsible Division Leader/Designee will provide written comments to CCP using Document Review Record in accordance with CCP-QP-010.

4.21.8 CCP, at its discretion, may request objective evidence to support the competency of Host site/generator reviewers.

4.21.9 The CCP Project Manager/Designee will confirm with the Responsible Division Leader/Designee that Triad written comments are resolved and Triad concurrence is provided prior to proceeding with CCP operations under the scope of the document being reviewed.

4.22 Documents/Records

4.22.1 Any CCP document, which includes LANL information, or Triad document that is intended for public release must be reviewed prior to release by a Derivative Classifier (DC) as detailed by DC guidance document.

4.22.2 Any draft CCP document that requires a formal review and approval (e.g., AKSR) must be reviewed by a DC for an initial classification release.

4.22.3 Documents listed in steps 4.22.4 and 4.22.5, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence.

4.22.4 Documents to be provided by Triad after completion of DC review to CCP personnel include copies of the following:

- [A] Existing AK documentation including, but not limited to: source documents, spreadsheets, NCR, VE, PID information, and characterization raw data.
- [B] Changes to container data information (to include overpacking information) after AK has been collected and/or reconciled.
- [C] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to characterization activities.
- [D] Radiological dose rate and surface contamination results on waste drums as needed to support WDS data entry.
- [E] Copies of calibration certifications for M&TE used by CCP.

4.22.5 Documents to be provided by CCP (No DC review required) to Triad personnel, as applicable, include copies of the following:

- [A] Completed BDRs for all processes.
- [B] Copy of WSPF for concurrence.
- [C] Copy of AK Summary Reports for concurrence.

- [D] Lot Evaluation documentation.
- [E] Completion of CCP Training/LOQI updates.
- [F] AK Tracking Spreadsheet.
- [G] NCRs and WIPP Forms generated.
- [H] Other reports generated to support a certified program.
- [I] Daily Production Reports.
- [J] CCP Interface Waste Management Document Lists.
- [K] CCP AKA.

4.22.6 Documents that are generated at LANL during the implementation of the TRU waste characterization and disposal at WIPP will be processed through the CCP Records process in accordance with CCP-QP-008. After completion of all activities, or sooner if no longer required to support the active record, the records will be transmitted to the WIPP Records Archive for retention.

4.23 Procurement

4.23.1 Qualified Triad personnel may procure, inspect, and perform receipt inspection of U.S. Department of Transportation (DOT) Type 7A containers, filters, gases and various non-quality affecting items for certified CCP operations in accordance with Triad procurement requirements.

4.23.2 Triad personnel will perform procurement activities in accordance with its QSL-accepted program.

4.23.3 CCP may procure, inspect, and perform receipt inspection of quality-affecting items (e.g., DOT Type 7A containers, filters, and gases) and various nonquality affecting items for certified operation in accordance with CCP procurement requirements. Quality-related procurements ordered by CCP require a CCP receipt inspection only; they **DO NOT** require a Triad QA receipt inspection. Documentation of these inspections will be made available to the Triad Institutional Quality & Performance Assurance (IQPA) Division Leader/Designee upon request.

4.23.4 All procurements for commodities (e.g., Pipe Overpack and SWB) procured through CBFO's Central Procurement Program (CPP) will require Triad receipt inspection, see <http://www.wipp.energy.gov/library/cpp/cpp.htm> for full list of items that require procurement through CPP.

4.24 Deficiencies

4.24.1 When nonconforming condition associated with a waste container during the characterization or certification process is identified, CCP personnel will initiate an NCR in accordance with CCP-QP-005.

4.24.2 The CCP Project Manager/Designee will notify the Responsible Division Leader/Designee of nonconformances by the distribution of NCRs. The Responsible Division Leader/Designee may request any supporting documentation needed by Triad.

NOTE

In some cases, Triad will perform the work required to resolve conditions identified in CCP NCRs and will initiate internal documentation as required by the Triad program. However, the CCP NCRs will remain open and CCP NCR Hold Tags will remain on the affected containers until resolution of the NCR condition has been confirmed by CCP under its program. At that point, CCP will close the NCRs and remove the NCR Tags.

4.24.3 If the nonconformance can **NOT** be resolved by CCP (e.g., certain prohibited items or non-certifiable container types), CCP will coordinate with the Responsible Division Leader/Designee to determine the actions to be taken.

4.24.4 CCP will notify the Triad FOD, Responsible Division Leader/Designee, and the CCP Project Manager/Designee immediately of occurrence reports or potential PAAA issues resulting from the CCP scope of work.

4.24.5 The NWP QA will confirm appropriate closure of NCRs.

4.24.6 When a Condition Adverse to Quality (CAQ) is identified by CCP personnel during performance of CCP activities, CCP personnel will initiate a WIPP form using WP 15-GM1002, Issues Management Processing of WIPP Forms.

4.24.7 The CCP Project Manager will notify Triad RDL of WIPP forms relevant to Triad. Copies of these WIPP forms will be provided to Triad RDL upon request.

4.25 Quality Assurance (QA)

4.25.1 All quality affecting work performed in the completion of this waste characterization, certification, and transportation scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.

4.25.2 NWP-QA will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.

4.25.3 The Host site will conduct documented surveillances/observations to assess compliance with applicable procedures.

4.26 Notification

4.26.1 Triad shall notify CCP when there are changes in the Host site facilities used by CCP for characterization activities or changes that may impact operations.

4.26.2 Triad shall notify CCP when there are changes to policies, processes, or procedures that may affect CCP characterization activities or operations.

4.26.3 Triad shall notify CCP prior to making repairs or modifications to transportation trailers or packaging equipment (TRUPACT-II, HalfPACTs, etc.). CCP will then notify the appropriate cognizant engineer at the WIPP site. The cognizant engineer will verify the modification/repair.

4.26.4 Triad shall notify CCP when criteria for reporting container conditions change.

4.26.5 Triad SHALL provide documented notification to the CCP SPM/Designee of any changes in waste information pertinent to TRU waste containers including generations of new containers, repackaging of existing containers, container type changes, changes in closure dates, filter change information, waste stream profile changes and/or EPA HWN assignment.

4.26.6 CCP shall ensure changes to equipment are in accordance with CCP-CM-001, *CCP Equipment Change Authorization and Documentation*.

4.26.7 CCP shall notify the Host site when there are configuration changes to CCP-provided equipment.

4.26.8 CCP shall notify the Responsible Division Leader/Designee of various container conditions (e.g., FGE) as identified in the previous sections.

4.26.9 CCP shall provide a documented request to Triad Responsible Division Leader/designee if additional information is required to ensure compliance with the CCP certified program when the Triad provided notification of changes in waste information appears to be inadequate or when CCP determines further investigation to be warranted.

4.27 Occurrence Reporting and Processing System (ORPS) and Price-Anderson Amendments Act (PAAA)

4.27.1 CCP, through NWP established programs, maintains the responsibility for reporting potential PAAA issues resulting from the certification and transportation for TRU waste by CCP at LANL. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP for Triad.

4.27.2 The Host site maintains the responsibility for reporting potential PAAA issues resulting from issues with safe operation of CCP activities (e.g., Radiation Safety, IS, IH, FPP, Maintenance, LO/TO, Conduct of Operations, etc.) for Triad. This includes filing any ORPS reports resulting from issues with safe operations of CCP activities for Triad.

4.27.3 Both Triad and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operation of characterization or transportation related activities by CCP for Triad.

4.27.4 Both Triad and CCP shall invite the other to participate in the investigation of any characterization or transportation activities that result in an ORPS or PAAA report.

4.27.5 Both Triad and CCP shall support and participate in investigations when CCP characterization or transportation activities result in an ORPS or PAAA report.

4.28 Authorization Basis (AB) and Configuration Management

4.28.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved Host site Documented Safety Analysis (DSA).

- [A] The Host site shall provide to CCP, Host site generated AB documentation concerning CCP related activities and equipment, including USQDs, for CCP's review.
- [B] CCP has primary responsibility to control operations and CCP-provided equipment configurations to ensure compliance with CCP and Host site procedures that protect the personnel, the public, and the environment.
- [C] For CCP provided equipment, CCP will provide the documentation necessary for the Host site to perform the evaluation against its safety analysis. This documentation may include Health and Safety Programs (HSPs), hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and the Host site.
- [D] For Host site-provided equipment, CCP will review operational and AB documentation, including USQDs, prior to assuming operation of the equipment to ensure the protection of personnel, the public, and the environment.
- [E] All changes to equipment operated by CCP will be controlled by the Host site Work Control Program to ensure appropriate AB evaluations are conducted, and associated controls established.
- [F] The Host site will make available all changes to AB requirements that affect CCP operations to CCP prior to implementation.

4.29 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program*

4.29.1 The requirements of 10 CFR Part 851, *Worker Safety and Health Program* are incorporated by LANL by PD100, *DOE/NNSA Approved Los Alamos National Laboratory 10 CFR 851 Worker Safety and Health Program Description*. All work performed by CCP for Triad will be in accordance with PD100.

4.30 Remote-Handled (RH) Waste Stream

4.30.1 Upon implementation of a remote-handled (RH) Program specific roles and responsibilities will be established for personnel under the CCP RH Program.

5.0 RECORDS

- 5.1 Records are generated during the implementation of procedures referenced in this Interface Document. These records are maintained as QA records in accordance with CCP-QP-008. No additional records are generated as a result of this Interface Document.

6.0 OVERSIGHT

NOTE

DOE has delegated the authority to CCP to characterize and certify TRU waste to be shipped to the WIPP. Nonetheless, Triad retains the responsibility for proper disposal as the waste generator on behalf of DOE. Accordingly, the following actions will define the level of oversight of the CCP by Triad personnel.

- 6.1 Triad will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation Triad is fully compliant with waste disposal requirements as set forth in the CH and WAC and WAP. However, Triad may conduct, at their discretion, periodic surveillances of CCP operations.
- 6.2 Following successful completion of the CBFO certification audit, Triad QA will conduct periodic documented surveillances/observations to ensure CCP work is conducted in accordance with CCP procedures. These documented surveillances/observations will be conducted in accordance with Triad QA procedures.
- 6.3 Triad QA will provide copies of its documented surveillance/observation reports to the CCP SPM. The CCP SPM and NWP QA will take the following actions:
 - 6.3.1 Review Triad documented surveillance/observation reports for any finding or other deficiencies against the CCP scope of work.
 - 6.3.2 Document and perform corrective actions in accordance with applicable NWP issues management procedures.
 - 6.3.3 Provide Triad QA with CCP actions to correct the identified deficiencies.
 - 6.3.4 NWP QA will maintain an information file of the Triad documented surveillance/observation reports conducted on the CCP scope of work.

Figure 1. CCP-Triad Communications Flow Chart

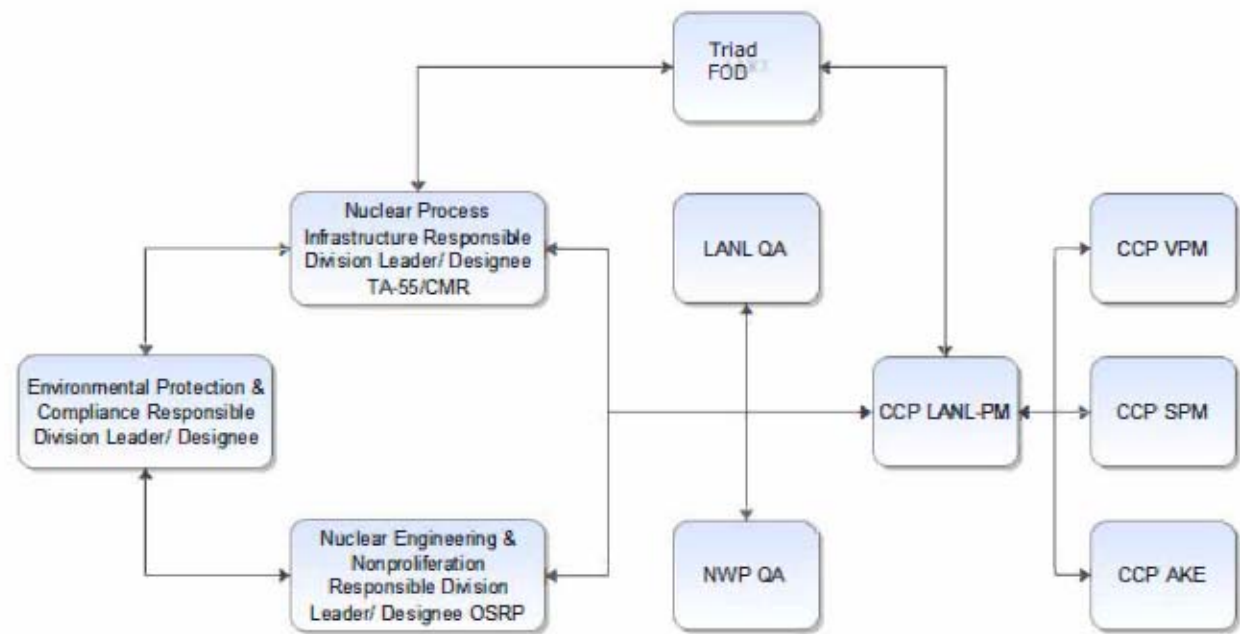


Figure 2. Nuclear Waste Partnership – LANL

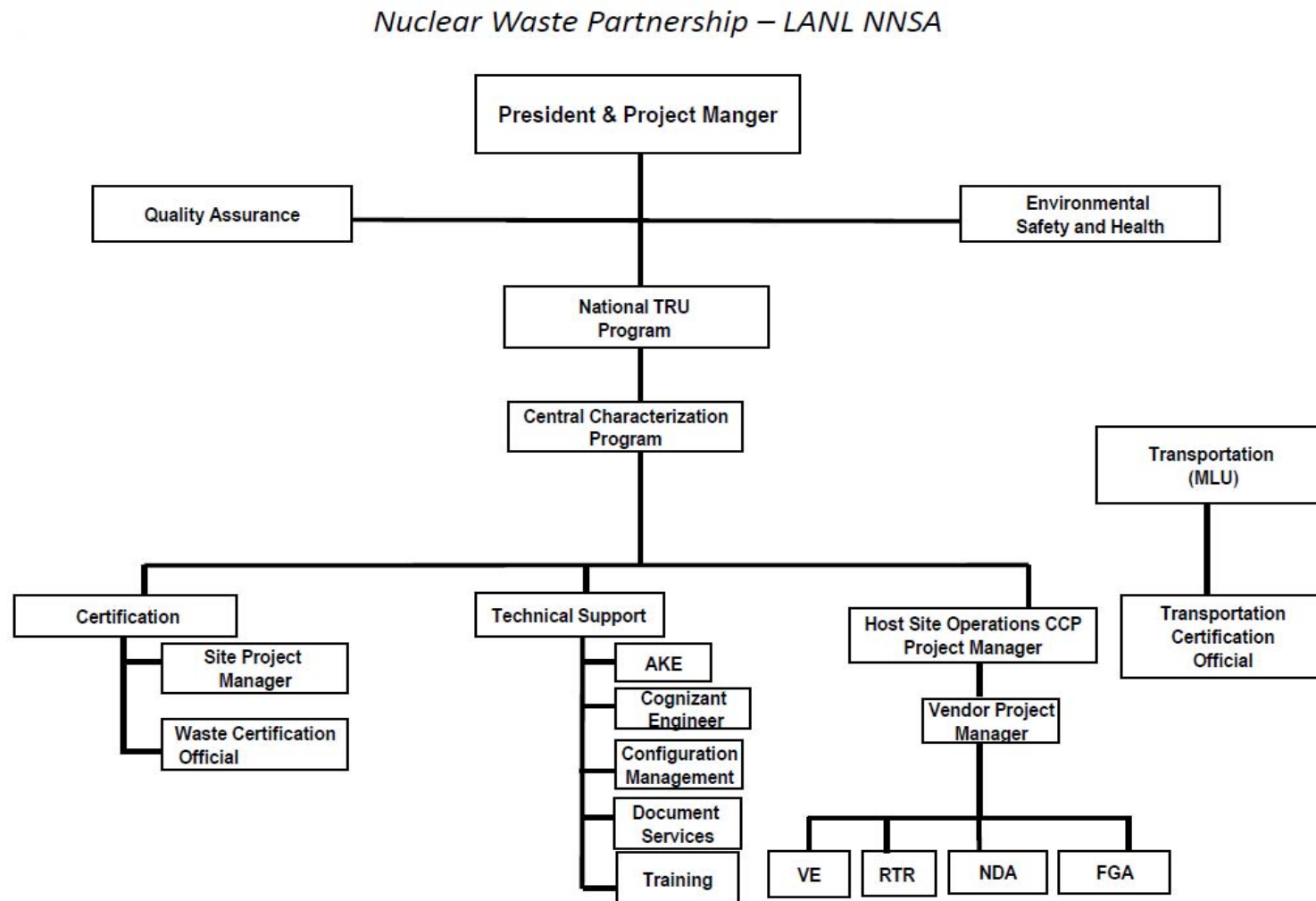
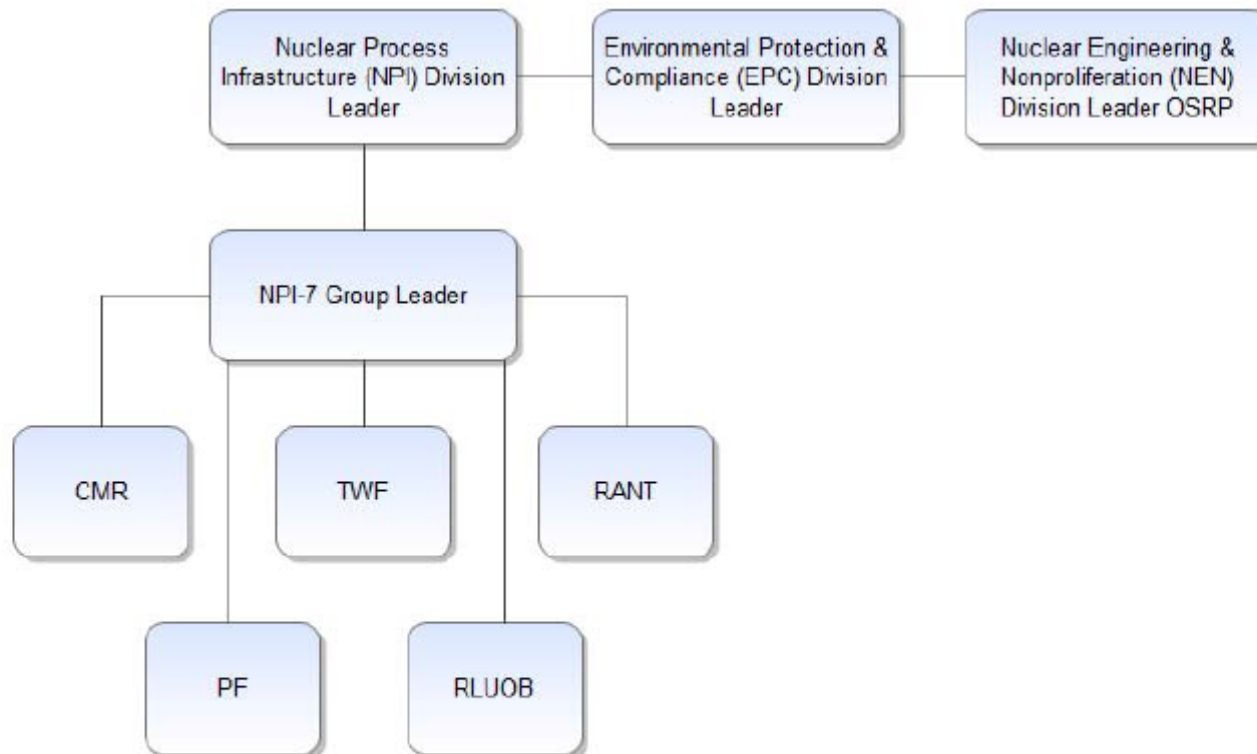


Figure 3. Triad Organizational Flow Chart



CCP-PO-048

Revision 4

CCP/LLNL Interface Document

EFFECTIVE DATE: 03/29/2022

Daniel Wade

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	02/20/2017	Initial Issue.
1	10/29/2018	Revised to add a section for visual examination (VE) and to add language that requires the Lawrence Livermore National Laboratory (LLNL) to provide personnel to be trained and qualified under the Central Characterization Program (CCP) as requested by CCP; also incorporated editorial corrections.
2	11/12/2019	Deleted steps 3.6.18 and 3.7.12; made minor word corrections to Sections 4.2, 4.10.4, 4.13.1, 4.13.4, and 4.17.2; revised Section 4.21.4 to include Acceptable Knowledge Assessments (AKAs) in response to Carlsbad Field Office (CBFO) Corrective Action Report (CAR) 19-075.
3	07/27/2021	Revised to add revised contract requirements and to add Q clearances. Updating title of WP 15-GM1002, <i>Issues Management Processing of WIPP Forms to Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.
4	03/29/2022	Revised purpose section to define Central Characterization Program (CCP) support for Lawrence Livermore National Laboratory (LLNL). Removed Real-Time Radiography (RTR) from document as RTR is no longer being used at LLNL.

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1.0 PURPOSE

This document establishes the interfaces between the Central Characterization Program (CCP) and the Lawrence Livermore National Laboratory (LLNL). This Interface Document subordinate to the upper-tier agreement, defines the interfaces between CCP and LLNL and details how the services described in the Statement of Work (SOW) are executed. The CCP is operated by Nuclear Waste Partnership (NWP) at the direction of the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO).

It is not intended to be used in lieu of a task-specific subcontract. Specifically, this document identifies CCP and LLNL/generator responsibilities for implementing requirements and deliverables.

1.1 Background

The LLNL is a transuranic (TRU) waste generator site in the DOE complex located in Livermore, CA. The National Nuclear Security Administration (NNSA) Livermore Field Office (LFO) oversees waste management at the LLNL for the DOE.

The DOE CBFO has deployed the CCP to the LLNL to characterize, certify, and ship contact-handled (CH) TRU waste for disposal at the Waste Isolation Pilot Plant (WIPP). Prior to shipment, the CCP will be audited and certified by CBFO to perform these activities at the LLNL.

1.2 Scope

This document applies to the CCP and the LLNL, and addresses their responsibilities associated with TRU waste characterization, including interface requirements for the following areas:

- Facilities/equipment for TRU waste characterization and shipping
- Safety Programs
- Training and qualifications
- Container Management
- Deficiencies and nonconformances
- Visual Examination (VE)
- Nondestructive assay (NDA)
- Gas Generation Testing (GGT)
- Flammable Gas Analysis (FGA) for transportation requirements

- Performance Demonstration Program (PDP)
- Source control
- Acceptable Knowledge (AK)
- Data validation and reconciliation
- Measuring and Test Equipment (M&TE)
- Work Standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- TRU Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry
- Transportation
- Configuration Management

As requested by LLNL, CCP will provide personnel to operate LLNL NDA equipment using LLNL procedures to support LLNL low-level waste (LLW) determination. LLNL is responsible for training and qualifying CCP operators to perform operations of LLNL equipment. Data analysis will be provided to LLNL by CCP Expert Analyst (EA). Data generated by the EA specific to LLNL LLW will meet the requirements specified by LLNL. LLW determination remains the responsibility of LLNL.

These services will be performed with CCP and/or LLNL equipment with appropriate DOE/CBFO-certified procedures.

The LLNL services covered by this document include programs for Radiological Controls, Occupational Safety and Health, Industrial Hygiene, Nuclear Safety/Authorization Basis (AB), Emergency Management, and Environment/Hazardous Waste Management.

The Host site maintains ownership of the waste and the responsibility for its disposal. This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP Co-Permittees. LLNL will also be responsible for reporting conditions or concerns that have or may have safety, health, QA, security, operational, or environmental implications.

2.0 REQUIREMENTS

All services provided by CCP will comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC), the Waste Isolation Pilot Plant Hazardous Waste Facility Permit, Waste Analysis Plan (WIPP-WAP), Certificates of Compliance (COCs) for Type B Packages issued by the Nuclear Regulatory Commission (NRC), and DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD).

Requirements from these upper-tier documents flow down to the following program documents:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- DES-2450, *Worker Safety and Health Program (WSHP)*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- WP 13-1, *Nuclear Waste Partnership LLC Quality Assurance Program Description*
- LLNL-MI-664423, *Lawrence Livermore National Laboratory's Radiation Protection Program (RPP)*

A more comprehensive list of documents included in the CCP System of Controls is provided in Section 4.22.4.

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization, certification, and transportation activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, VE, NDA, GGT, FGA for waste certification, WWIS/WDS data entry, and transportation activities.

The LLNL Management and Operating (M&O) Contractors' responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with LLNL documents provided to CCP.

3.1 Operations

3.1.1 CCP performs the following operation activities:

- [A] Obtains LLNL management daily release/approval prior to performing CCP operations.
- [B] Performs system start-up and calibration of characterization equipment.
- [C] Operates CCP equipment in accordance with approved procedures including CCP-PO-005, *CCP Conduct of Operations*.
- [D] Performs safety walk-downs prior to operations.
- [E] Responds to and resolves assessment and surveillance findings for CCP activities.
- [F] Ensures CCP personnel are trained and qualified in accordance with requirements specified in the Training and Qualification section of this document.
- [G] Demonstrates CCP operations during DOE/CBFO certification/recertification audits.
- [H] Performs Management Assessments and QA Surveillances on: 1) CCP Operations and 2) LLNL waste management activities referenced in active CCP AK Summaries/Waste Stream Profiles.
- [I] Performs inspection of containers provided by the LLNL to ensure they are safe and ready for CCP characterization.

3.1.2 The LLNL provides the following support for CCP activities:

- [A] Radiological controls as needed to support characterization activities, including:
- Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide an approved survey report to the CCP Vendor Project Manager (VPM).
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation.
 - Radiological Work Permits (RWP) to support CCP activities.
 - Bioassay sample collection, evaluation, and reporting, in accordance with 10 Code of Federal Regulation (CFR) 835.402, *Individual Monitoring*, if applicable. The CCP LLNL Project Manager (PM) or CCP VPM will be notified of any positive bioassay results as soon as is reasonably possible.
 - Radiological source controls.
 - Radiation dose rate surveys for container certification and shipment.
- [B] Provides adequate facilities for the safe performance of characterization and transportation activities.
- [C] Provides site-specific training, as needed, to ensure safe operations.
- [D] Provides Industrial Safety and Health (IS&H) support.
- [E] Provides Fire Protection and Emergency Management support.
- [F] Provides AB oversight, including Unreviewed Safety Question (USQ) evaluations.

- [G] Provides environmental impact oversight and support.
- [H] Provides on-site container transportation.
- [I] Provides container handling, inventory control, and storage location tracking.
- [J] Provides personnel to be trained and qualified under the CCP, as needed, to support CCP activities.
- [K] Coordinates and obtains document classification reviews as required to allow the public release of documents such as the AK Summary Report.
- [L] Provides calibrated M&TE for use in characterization or obtains calibrated service for CCP provided M&TE.
- [M] Provides waste packaging materials and other equipment/materials purchased and inspected in accordance with the Qualified Supplier List (QSL) approved program.
- [N] Provides hazardous waste manifesting, bill of lading, and notifications for transportation.
- [O] Provides qualified personnel to support maintenance of CCP equipment.
- [P] and CCP QA surveillance findings related to LLNL waste management activities.

3.2 CCP LLNL Project Manager (PM)

- 3.2.1 Functions as CCP's primary interface and point-of-contact (POC) between CCP and the Site Management Representative (SMR)/Designee for waste characterization and certification activities.
- 3.2.2 Unless otherwise assigned herein, ensures documents listed in Section 4.21.4 are provided to the LLNL.
- 3.2.3 Ensures sufficient characterization equipment and personnel are available to perform the required characterization activities at the LLNL.
- 3.2.4 Provides status on CCP characterization operations to the SMR/Designee.

- 3.2.5 Works in conjunction with SMR/Designee to establish and maintain reasonable and appropriate throughput of waste containers.
- 3.2.6 Ensures CCP management and CBFO are informed of safety, compliance, or production issues impacting CCP LLNL activities.
- 3.2.7 Ensures the CCP Management Assessment Program is implemented for CCP Operations and LLNL waste management activities related to active CCP AK Summaries/Waste Stream Profiles.
- 3.2.8 Works with the SMR to schedule and ensure access to areas to perform visual observations of active waste streams.
- 3.3 CCP Site Project Manager (SPM)
 - 3.3.1 Functions as CCP's primary WIPP Waste Acceptance Criteria (WAC) and Waste Analysis Plan (WAP) Subject Matter Expert (SME) and compliance authority.
 - 3.3.2 Ensures the AK Summary Report for TRU waste characterized by the CCP is provided to the SMR/Designee.
 - 3.3.3 Ensures Waste Stream Profile Forms (WSPFs) are reviewed and approved.
 - 3.3.4 Ensures that project level verification and validation of batch data reports (BDRs) are completed.
 - 3.3.5 Provides evidence to the SMR/Designee of PDP participation and successful completion.
 - 3.3.6 Ensures field observations of waste management activities are performed in accordance with CCP-PO-045, *CCP Waste Management Field Observation*.
- 3.4 Acceptable Knowledge Expert (AKE)
 - 3.4.1 Collects, compiles, reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.4.2 Ensures CCP has obtained necessary container information prior to characterization.
 - 3.4.3 Prepares and maintains the Interface Waste Management Document List (IWMDL) for each waste stream, including the identification (ID) of the applicable procedure POCs/SMEs involved

directly with the generation of each waste stream (identified by the SMR).

3.4.4 Performs Chemical Compatibility Evaluations.

3.4.5 Submits IWMDL and associated quarterly SMR notifications to the Site Project Manager (SPM) to submit to records.

3.5 CCP Quality Assurance (QA) Engineer

3.5.1 Functions as NWP's primary interface and POC for QA matters between CCP, LLNL, DOE/LLNL, and DOE/CBFO.

3.5.2 Validates the Nonconformance Reports (NCRs) generated by CCP personnel performing characterization activities at the LLNL.

3.5.3 Distributes copies of NCRs in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.

3.5.4 Ensures receipt inspection is conducted in accordance with CCP-QP-026, *CCP Inspection Control*, for items and services procured by CCP.

3.5.5 Provides the SMR/Designee with a copy of the semi-annual trending summary reports in accordance with CCP-QP-019, *CCP Quality Assurance Reporting to Management*.

3.6 LLNL Site Management Representative (SMR) (LLNL Management Position)

3.6.1 Functions as the LLNL primary interface and POC between the LLNL and CCP.

3.6.2 Ensures cognizant LLNL POCs/SMEs are identified and available as necessary to support the review of CCP documents.

3.6.3 Coordinates review, provides comments, and approves comment resolutions on documents listed in Section 4.21.4. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.

- 3.6.4 Ensures unreviewed safety question determination (USQDs) needed for proposed modifications to CCP hardware, software, or procedures are prepared and approved by qualified LLNL personnel prior to CCP implementing the proposed modification.
- 3.6.5 Ensures CCP is provided appropriate facilities, construction services, utilities, phone services, network services, and office services necessary to perform their activities at the LLNL.
- 3.6.6 Notifies the CCP PM and VPM of any Safety Basis changes to action levels that will impact CCP initiated notifications.
- 3.6.7 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
- 3.6.8 Ensures site support (e.g., Radiological, IS&H, waste handling, etc.) is available for waste characterization.
- 3.6.9 Ensures CCP is notified of LLNL-specific training requirements for all CCP personnel performing work at the LLNL. This includes initial qualification as well as notification of upcoming refresher training.
- 3.6.10 Ensures documentation of completed LLNL-specific training is delivered to CCP Training.
- 3.6.11 Provides personnel to support characterization operations.
- 3.6.12 Provides personnel to support the CCP Acceptable Knowledge Expert (AKE) in the collection of documents.
- 3.6.13 Works in conjunction with the CCP PM and VPM to maintain reasonable and appropriate throughput of waste containers.
- 3.6.14 Ensures that periodic QA surveillances of CCP operations by the LLNL are conducted and reported to CCP.
- 3.6.15 Provides documented information on containers that have been modified since the original container closure and/or AK has been completed for the containers (e.g., remediation of containers or venting).
- 3.6.16 Provides adequate record storage facilities and access to the records for the CCP AK source documents.

- 3.6.17 Provides transportation personnel to support loading and transportation activities.
- 3.6.18 Ensures the provisions of LLNL-MI-763917, *Lawrence Livermore National Laboratory's Radiological Protection Program* (RPP) are implemented and compliance is maintained.
- 3.6.19 Ensures that the LLNL AB represents the CCP activities and equipment correctly.

3.7 CCP Vendor Project Manager (VPM)

NOTE

VPM will assume overall CCP responsibility for characterization and loading activities if Mobile Loading Unit Team Lead is not present at the LLNL. If present, the Mobile Loading Unit Team Lead will assist VPM with duties associated with loading and shipping.

- 3.7.1 Ensures CCP and LLNL personnel are trained and qualified to perform WIPP-compliant TRU waste characterization activities at the LLNL prior to commencement of work activities.
- 3.7.2 Obtains LLNL management daily release/approval prior to performing CCP operations.
- 3.7.3 Monitors the List of Qualified Individuals (LOQI) at the beginning of the shift to confirm that only qualified personnel perform waste characterization activities.
- 3.7.4 Works in conjunction with CCP PM and LLNL SMR/Designee to maintain reasonable and appropriate throughput of waste containers.
- 3.7.5 Provides daily pre-operations briefing to CCP personnel. The daily pre-operations briefing may be combined with the LLNL pre-operations briefing as agreed between the CCP LLNL PM and LLNL operations management.
- 3.7.6 Ensures applicable manufacturers Material Safety Data Sheets (MSDSs)/Safety Data Sheets (SDS) for products to be brought to the facility by the CCP are provided to the SMR for authorization, maintained, and made available to support operations and meet the requirements of the LLNL chemical management program.
- 3.7.7 Provides oversight of CCP field operations to ensure safe, compliant, and efficient operations.

- 3.7.8 Notifies the CCP LLNL PM and the SMR/Operations Manager of any abnormal events associated with safe and compliant operation of CCP characterization activities for reporting purposes.
 - 3.7.9 Ensures CCP notifications required to comply with the LLNL Safety Basis are incorporated into appropriate CCP work documents and appropriate CCP personnel (including offsite personnel such as Independent Technical Reviewers [ITRs], NDA Expert Analyst [EA], and SPMs) are aware of their responsibility to make such notifications.
 - 3.7.10 Obtains SMR review and concurrence prior to issuance/approval of CCP Operator Aids or Standing Orders that could affect changes to equipment operation or configuration.
 - 3.7.11 Attends daily LLNL Plan of the Day meeting where safety issues and activities for the day are discussed, facility status is reviewed, and radiological changes are identified.
 - 3.7.12 Ensures CCP personnel comply with LLNL integrated work management, environmental, safety, and security requirements.
 - 3.7.13 Controls access of CCP personnel including its subcontractors to the field. Requests site access for visitors.
 - 3.7.14 Functions as CCP's primary interface and POC between CCP and LLNL for field operations.
 - 3.7.15 Works with CCP Configuration Management group to ensure that CCP-provided equipment is maintained under a CCP approved Configuration Management Program.
 - 3.7.16 Ensures that new additions to and/or modifications made to CCP provided facilities and/or equipment are submitted to the SMR as soon as practicable and approvals are received prior to implementation.
- 3.8 CCP Waste Certification Official (WCO)
- 3.8.1 Obtains copies of approved WSPFs for containers to be certified.
 - 3.8.2 Certifies container(s) that meet requirements for disposal in the WIPP repository.
 - 3.8.3 Submits certified container data to the WWIS/WDS.

- 3.9 CCP Transportation Certification Official (TCO) or Mobile Loading Unit Team Lead
 - 3.9.1 Ensures CCP Transportation personnel are trained and qualified to perform WIPP-compliant CH TRU waste packaging and loading operations at the LLNL prior to starting work activities and are listed on the current LOQI.
 - 3.9.2 Provides oversight to CCP Transportation personnel for payload and Overpack assembly and loading.
 - 3.9.3 Builds payloads from certified containers and Overpacks provided by Waste Certification Officials (WCOs) in WWIS/WDS.
 - 3.9.4 Certifies payloads for transportation to and disposal at the WIPP.
 - 3.9.5 Builds shipments from approved payloads in WWIS/WDS.

4.0 PROCEDURE

4.1 Initial Setup for Operations

4.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host site SMR/Designee, who will coordinate facility, QA, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site safety basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures and processes.
- [D] Mobilization of project staff and equipment.

4.1.2 LLNL is responsible for the following during initial setup:

- [A] Providing office space for CCP personnel and locations and utilities for CCP equipment.
- [B] Reviewing and approving work packages for CCP equipment setup.
- [C] Providing CCP personnel with computer access, badging, and Host site required reading.
- [D] Defining and coordinating readiness activities as needed to support authorization of CCP activities at the LLNL.

4.2 Training and Qualification

4.2.1 CCP personnel or LLNL personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.

4.2.2 Both the CCP training and LLNL-specific training must be complete prior to the individual being assigned to perform independent work at the LLNL.

- 4.2.3 CCP and LLNL personnel assigned to field operations must first complete the required LLNL-specific training. The SMR will ensure that the LLNL-specific training documentation is sent to CCP Training and notification of upcoming training is sent to the VPM.
- 4.2.4 Administrative work, such as BDR reviews that require no access to the characterization equipment or processes at the Host site, may be completed by personnel who have not completed the Host facility required site-specific training. Personnel who have not completed Host facility site-specific training will not be allowed unescorted access to the characterization equipment.
- 4.2.5 A LOQI will be monitored by the CCP VPM to confirm CCP and LLNL personnel assigned to perform work are qualified. This documentation shall be available on the secure file transfer protocol (sftp) site for all personnel to review their qualification status.

4.3 Routine Operations

4.3.1 General Conditions of Operation

- [A] The LLNL has the overall responsibility for the management of the nuclear materials and operations of the nuclear facilities.
- [B] Work performed by CCP personnel (including subcontractors) will be in compliance with LLNL and CCP requirements.
- [C] CCP personnel will STOP WORK (or Pause), as appropriate and will notify LLNL supervision and the CCP VPM in the event of a safety concern (e.g., Technical Safety Requirement (TSR) violation, Price Anderson Amendment Act (PAAA) violation, breached container, emergency, injury, potential compliance violation).
- [D] CCP personnel will follow CCP-PO-005, for reporting employee concerns or abnormal conditions.

4.3.2 CCP personnel will work under the LLNL requirements for hazardous energy control.

4.3.3 CCP personnel will perform work in accordance with CCP-approved procedures for waste characterization and certification activities and LLNL-approved work packages and procedures for non-waste characterization activities (e.g., equipment repairs). Both CCP-approved and LLNL-approved processes will comply with LLNL requirements.

4.3.4 To ensure that notifications are made by offsite review personnel (e.g., ITR, NDA EA, SPM) for LLNL safety basis notification levels, the LLNL action levels will be included in a CCP Standing Order. Any revisions to the LLNL action levels will be issued in a revision of the CCP Standing Order.

4.4 Employee Monitoring

4.4.1 CCP personnel will participate in the LLNL Bioassay program and will submit bioassay samples if required by the LLNL Radiation Protection Program to establish a baseline for activities at the LLNL.

4.4.2 The CCP LLNL PM or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.

4.5 Filter Inspection/Filter Changeout

4.5.1 CCP personnel will inspect the filters on containers as part of the container acceptance and will document whether the filter is a WIPP-approved filter. This information will be transmitted to the CCP VPM.

4.5.2 Filter change outs shall be performed by the LLNL. Filter change outs performed on containers that do not require repackaging shall be documented and transmitted to the CCP VPM.

4.6 Security Clearances

4.6.1 One NDA Operator SME/OJT and one VE expert will require Q clearances to support work in the super block facility.

4.7 Container Management

4.7.1 The LLNL provides container movement and storage compliant with the Documented Safety Analysis (DSA).

4.7.2 The LLNL provides the dose rate and surface contamination information necessary to certify TRU waste containers for disposal.

4.7.3 All waste containers provided to CCP for characterization will begin with a site identifier prefix (e.g., "LL").

4.7.4 LLNL is responsible for providing documented information to the SPM on any modification to the container after original container closure and/or AK has been completed.

- 4.7.5 The SPM will review the documented information of modified containers and will notify the SMR when the containers are approved for entrance into the CCP characterization process.
- 4.7.6 CCP performs container management throughout the CCP characterization process in accordance with CCP-TP-068, *CCP Standardized Container Management*.
- 4.7.7 CCP AK personnel will maintain a list of characterization-eligible containers from each waste stream identified. When repackaging of a waste container is required, the following container ID scheme will be followed as applicable.
- [A] When the waste from one TRU input container results in one TRU output container, the container ID from the Input container is to be used with the addition of an "A" suffix as the ID number on the output container (e.g., input container is LL10C0057, the output container will be labeled as LL10C0057A). This scheme is also to be applied to re-label waste containers that do not require repackaging.
 - [B] When the waste from one TRU input container results in the creation of two or more TRU output containers, a standard convention of adding a sequential single or, if required, double letter suffix to the input container's ID number is used to label the TRU output containers produced (e.g., input container is LL10C0057, the first output container is LL10C0057A, and the second output container is LL10C0057B).
 - [C] When the waste from two or more TRU input containers from the same waste stream are combined into one output container, the container ID number from the first input container is used with the addition of an "A" suffix as the ID number on the TRU output container (e.g., LL10C0057 and LL10C0059 are combined into one output container. LL10C0059 was the first drum repackaged. The output container is LL10C0059A).
 - [D] When prohibited items are segregated and placed into a separate output container from the bulk of the waste, a new container ID is applied to the segregated waste container. Prohibited items from more than one input waste container may be placed into the segregated waste container provided the input containers are from the same waste stream.

- [E] CCP AK personnel are to be notified as soon as is practical of waste container ID number changes resulting from the actions in steps 4.7.7[A] through [D].

4.8 Deficiencies and Nonconformances

4.8.1 CCP Identified Deficiencies and Nonconformances

NOTE

The NWP QA Engineer will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If personnel identify a nonconforming condition associated with a waste container during the CCP characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
- [B] If the deficiency or nonconformance is an issue that will be resolved by CCP, CCP will provide notification (e.g., verbal, or email as requested by the LLNL) to the LLNL SMR/Designee. The LLNL SMR/Designee may request any supporting documentation needed by the LLNL. CCP will ensure appropriate closure of the deficiency. A copy of any CCP NCR related to DOE TRU waste at the LLNL will be provided to the LLNL SMR/Designee upon request.
- [C] **IF** the deficiency or nonconformance cannot be resolved by the CCP (e.g., does not meet WIPP-WAC), **THEN** the specific container will be returned with all required documentation to the LLNL for disposition. Once the specific container(s) have been returned to the LLNL, the NCR will remain open if the container will be remediated and returned to CCP or will be closed if the condition is such that the container will not be returned to CCP (e.g., NDA indicates the container is less than 100 nanocuries per gram [nCi/g] TRU alpha activity concentration). CCP will not apply CCP HOLD TAGS to those containers which are returned as permanent rejects from CCP. Instead, CCP will affix a physical indicator (sticker or tag) that the container is returned and not certifiable for shipment to WIPP.

4.8.2 LLNL-Identified Deficiencies and Nonconformances

- [A] If LLNL personnel identify a non-conformant condition during container movement or handling (e.g., missing container identification tag, duplicate container number), LLNL personnel will initiate nonconformance documentation in accordance with the LLNL QA Program.
- [B] The SMR will ensure a copy of any NCR affecting the CCP is provided to the SPM.
- [C] The SMR will notify the CCP LLNL PM and VPM of any procedure deficiencies, identified by LLNL personnel, which relate to characterization activities.
- [D] The SMR will notify the Transportation Certification Official (TCO) or Mobile Loading Unit Team Lead, and VPM of any procedure deficiencies, identified by LLNL personnel, which relate to payload assembly or loading activities.

4.9 Visual Examination (VE)

- 4.9.1 CCP will conduct VE Operations in accordance with CCP-TP-113, *Standard Contact-Handled Waste Visual Examination*, as needed, using a facility provided by the LLNL.
- 4.9.2 Qualified LLNL personnel will manipulate waste as requested by the CCP VE Operator(s) during the VE process.
- 4.9.3 VE Operators will make notification to the LLNL as necessary to comply with the LLNL safety basis. These notifications will be made to LLNL management and the VPM.
- 4.9.4 If a later review (e.g., ITR, SPM) meets a LLNL safety basis notification criterion, notifications will immediately be made to LLNL management and the VPM.
- 4.9.5 The LLNL will perform maintenance and repairs to the VE facility.
- 4.9.6 The LLNL will provide personnel to qualify and perform VE in accordance with CCP-TP-113, as requested.

4.10 Nondestructive Assay (NDA)

4.10.1 The LLNL will provide support for CCP participation in the NDA PDP. This support includes maintaining trained PDP coordinators, preparation of the test containers, delivery of the containers to the CCP NDA equipment, and responsibility for PDP source control. The LLNL support will be coordinated by the SMR.

4.10.2 If NDA results meet the identified LLNL safety basis notification criteria, CCP NDA personnel will immediately make notifications. If notification levels are reached, NDA EA assay results will be performed and the resulting conclusions will be communicated both verbally and in writing to the LLNL management, SPM, and the CCP VPM within 24 hours of the first normal work day following the assay.

4.10.3 If a later review (e.g., ITR, SPM) meets a LLNL safety basis notification criterion, notifications will immediately be made to LLNL management and the VPM.

4.10.4 CCP will perform NDA using equipment managed and controlled by CCP. Containers rejected by NDA will be dispositioned consistent with the requirements of the Deficiencies and Nonconformances section of this document.

4.11 Gas Generation Testing (GGT)

4.11.1 CCP will perform GGT sampling and analysis using GGT canisters in accordance with CCP-TP-083, *CCP Gas Generation Testing*, and CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*.

4.12 Flammable Gas Analysis (FGA)

4.12.1 FGA is for transportation only and will be performed using approved DOE/WIPP procedures by personnel trained under the CCP Qualification Program.

4.12.2 FGA operators will make notifications to the LLNL as necessary to comply with the LLNL Safety Basis. These Notifications will be made to the LLNL management and the VPM.

4.13 Source Control

4.13.1 CCP will provide certificates for the reference sources required for calibration of NDA systems used by CCP.

- 4.13.2 The LLNL will be responsible for all reference sources. Responsibilities consist of inventory control, storage, shipment, and usage. The LLNL will provide CCP the number of sources, location, isotopic distribution with activity levels, and the names of the custodian and authorized users, as required.
- 4.13.3 The LLNL will be responsible for providing radiological control support associated with the reference sources. This support consists of maintaining the radioactive materials area postings, periodic surveys, and performing a semi-annual leak check on the sources.
- 4.13.4 LLNL personnel will deliver the sources to qualified CCP personnel for loading into the matrix drums. CCP personnel will be trained as users of the sources to the LLNL work control procedures.
- 4.13.5 The LLNL will provide support for the CCP participation in the PDP. This support includes maintaining trained PDP coordinators, preparation of the test drums, delivery and pick-up of the drums to/from the CCP NDA equipment, and responsibility for PDP source control. LLNL support will be coordinated by the LLNL SMR/Designee.
- 4.13.6 Radioactive sealed sources, whether owned by CCP or LLNL, will be controlled under applicable requirements of the LLNL Radiological Control Program.
- 4.13.7 LLNL will provide support for leak testing, labeling, and inventory control for sealed sources owned and used by CCP NDA processes.
- 4.13.8 LLNL may provide radioactive sealed sources to the CCP NDA processes when required for use in meeting NDA quality assurance objectives.
- 4.13.9 CCP will submit a written request to LLNL before bringing any sealed radioactive source to LLNL. The request will be accompanied by a copy of the applicable Radioactive Materials License. LLNL will provide written permission to CCP to bring sealed radioactive sources to LLNL upon receipt and approval of CCP's written request.
- 4.13.10 CCP will provide day-to-day control of the sources it owns and uses in accordance with requirements in the LLNL Radiological Control Program.

4.14 Acceptable Knowledge (AK)

4.14.1 CCP AK Personnel collect, compile, and review AK documentation in accordance with CCP-TP-005.

4.14.2 LLNL personnel assist CCP AK personnel with AK collection.

4.14.3 CCP AK personnel and LLNL personnel develop an IWMDL for each waste stream. Each IWMDL will include facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning (D&D) operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

4.14.4 The SMR ensures POCs/SMEs are assigned to review the new or revised IWMDLs for accuracy and completeness and provide written comments as appropriate.

4.14.5 The AKE and LLNL/Cognizant Host site/generator Personnel (CP) resolve comments and questions.

4.14.6 SPM provides SMR with the results of Acceptable Knowledge Assessments (AKA).

4.14.7 SMR distributes results of the AKA to designated CPs for review and comment.

4.14.8 SMR concurs with final AKA in writing.

4.14.9 CCP submits new or revised AK Summary Reports to the SMR/Designee for review and concurrence.

- 4.14.10 The SMR ensures CP review the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.
- 4.14.11 LLNL CP or cognizant designees, attend briefings on new or revised AK Summary Reports.
- 4.14.12 LLNL CP notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to an IWMDL.
- 4.14.13 The LLNL will not provide any waste containers to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Orders, Operator Aids, etc.) used to generate, package, and/or repackage the container.
- 4.14.14 The work document(s) provided to the AKE will contain the following information at a minimum:
- ID (including revision) of the work document(s) used to generate the container
 - Type of activity (e.g., packaging/repackaging only, remediation, treatment)
 - Amount (estimated) and type (if known) of liquids
 - Type and quantity (estimated) of absorbents used
 - Type and quantity (estimated) of neutralization agents used
 - Any unexpected conditions or reactions encountered
 - General description of waste items
 - Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
 - Filter data including model and quantity used
 - Parent container identification

4.14.15 At a minimum of once per calendar quarter, LLNL management will review current IWMDLs and provide written assurance to the CCP SPM that the list is up to date OR provide necessary documentation to revise the list.

4.15 Project Office Certification Activities

4.15.1 CCP will prepare WSPFs for the subject LLNL waste in accordance with CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*.

4.15.2 CCP will transmit characterization and certification data using the WWIS/WDS and CCP procedures CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*.

4.15.3 CCP shall submit WSPFs to the LLNL for information before submittal to CBFO. The LLNL will provide written concurrence on the basis of continued compliance with procedures and programs, and CBFO-certification of the CCP program.

4.15.4 The CCP WCO will document and certify that all TRU waste payload containers meet the requirements of the WAC, and submit the data to the WWIS/WDS for approval.

4.16 Transportation

4.16.1 LLNL will provide and maintain CH Package Loading facilities.

4.16.2 CCP Transportation will provide technical resources, TCOs, and qualified personnel to perform the transportation certification, preparation of the shipment, and loading of the waste for shipment.

4.16.3 LLNL will provide the equipment and trained personnel required to handle waste containers for payload assembly and loading operations.

4.16.4 CCP Transportation will provide trained personnel required to handle waste containers for payload assembly and loading operations.

4.16.5 LLNL will provide manifesting, marking, labeling, and placarding of the shipments in accordance with 40 CFR and 49 CFR requirements and in accordance with site-specific procedures.

4.16.6 CCP Transportation will provide documentation to the SMR certifying the waste for shipment according to CCP procedures.

4.16.7 LLNL will coordinate the shipment, including providing prerequisite surveys.

4.17 Quality Assurance (QA)

4.17.1 All quality affecting work performed in the completion of this waste characterization, certification, and certification transportation scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.

4.17.2 NWP QA will conduct periodic QA surveillance to assess compliance with applicable WIPP requirements.

4.17.3 LLNL will conduct surveillances to assess compliance with applicable procedures.

4.18 Measuring and Test Equipment (M&TE)

4.18.1 M&TE used by the CCP will be controlled and maintained in accordance with CCP-QP-016, *CCP Control of Measuring and Testing Equipment*.

4.18.2 The LLNL will make available National Institute for Standards and Technology (NIST)-traceable calibration services for M&TE to the CCP. The LLNL will maintain records on M&TE calibration in accordance with their Records Inventory and Disposition Schedule. Copies of the Certificates of Calibration will be made available to the CCP VPM and CCP M&TE Custodian prior to issuing M&TE to CCP for use.

4.18.3 For LLNL M&TE furnished for use in the CCP program, the LLNL SMR or Designee will provide notification to the CCP M&TE Custodian when M&TE are added, deleted, found out-of-tolerance /defective, or failed calibration.

4.18.4 When notified of an as found, failed calibration CCP will perform an extent of condition review to assess its impact on any of the characterization processes, initiate an NCR (if applicable) and provide this info to the LLNL SMR/LLNL M&TE Custodian.

4.18.5 The LLNL SMR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.

4.18.6 The CCP M&TE Custodian will provide a recall notification for CCP M&TE that requires calibration to the LLNL SMR/M&TE Custodian.

4.19 Work Standards

- 4.19.1 CCP operations personnel will work under DES-2450, *Worker Safety and Health Program (WSHP)*.
- 4.19.2 LLNL procedures and work packages will be used for non-waste characterization activities (e.g., equipment repairs).
- 4.19.3 LLNL maintenance may assist CCP with equipment maintenance. All activities will meet CCP configuration and maintenance requirements and be authorized by the CCP VPM.
- 4.19.4 CCP operations personnel will operate in accordance with CCP-PO-005.
- 4.19.5 CCP personnel will comply with applicable LLNL procedures for activities they perform outside of the CCP system of controls.
- 4.19.6 CCP personnel will work under the LLNL safety basis and work control standards. Maintenance work control activities on CCP owned/leased equipment will be controlled using LLNL work authorization procedures.
- 4.19.7 CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, CCP-PO-026, *CCP Configuration Management*, and CCP-TP-140, *CCP Equipment Maintenance* will be followed in addition to the requirements of LLNL procedures for CCP owned/leased equipment.
- 4.19.8 The LLNL will not change the configuration of any characterization equipment used by CCP – regardless of ownership – without first obtaining written concurrence from the CCP VPM.
- 4.19.9 The CCP LLNL PM or VPM will notify the LLNL SMR/Designee when new CCP personnel, (NWP and subcontractors) are assigned to work at the LLNL. This notification will occur as soon as is practical.
- 4.19.10 The CCP LLNL PM or CCP VPM will notify the LLNL SMR when CCP personnel, NWP and subcontractors leave the LLNL as a result of reassignment or resignation. This notification will occur as soon as is practical.
- 4.19.11 The LLNL SMR will notify affected organizations to support the arrival or departure of CCP personnel.

- 4.19.12 LLNL Radiological Controls personnel will perform routine surveys for contamination and radiation as specified in LLNL policies or procedures. The CCP LLNL PM or CCP VPM and appropriate LLNL management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied areas. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.19.13 The LLNL will immediately notify the CCP LLNL PM or CCP VPM and appropriate LLNL management personnel of any abnormal continuous or fixed air sample filter analysis results from any area routinely occupied by CCP personnel.
- 4.19.14 CCP will provide historical information on the operation of any CCP equipment deployed at the LLNL for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.
- 4.19.15 For LLNL-supplied equipment and facilities, the LLNL is the Design Authority. It is expected that CCP will participate in review of hazard analysis for this equipment and facilities being provided.
- 4.19.16 For non-LLNL-provided equipment, CCP will provide the LLNL with information and documentation necessary for evaluation of compliance with the LLNL safety basis. CCP will be the Design Authority for the equipment. The programmatic limits for the operation of the characterization equipment are the responsibility of CCP as part of their Design Authority responsibilities.
- 4.19.17 CCP will control the procurement, development, maintenance, configuration management, and use of software used on all LLNL and non-LLNL-provided equipment used to develop quality-affecting data for waste characterization in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*.
- 4.19.18 LLNL maintains the right to inspect equipment being deployed to LLNL and request repairs be made for equipment that does not meet nationally recognized codes (e.g., National Electric Code).
- 4.20 Project Control
- 4.20.1 CCP and the LLNL will provide routine status for their respective scheduled activities.
- 4.20.2 CCP will maintain and provide the LLNL with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.

4.21 Procedures

4.21.1 CCP will develop new or revised procedures in accordance with CCP-QP-010.

NOTE

New technical operating procedures (procedures that operate equipment) developed by CCP and scheduled to be used at the LLNL, shall be evaluated by the LLNL SMR to determine if the procedure shall be added to the LLNL review list.

4.21.2 The SMR will review or designate the appropriate reviews of the CCP documents and procedures listed in Section 4.21.4, and forward written comments to CCP Document Control in accordance with CCP-QP-010, as requested.

4.21.3 The SPM will confirm that the SMR/Designee written comments are resolved with the host facility SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.21.4 The following documents and all revisions will be provided to the SMR for LLNL review. This review may be waived if the operational activity is not being performed at the site. Waived procedures will be reviewed before CCP operations commence utilizing the un-reviewed procedure.

- CCP Interface Waste Management Document Lists
- CCP LLNL Acceptable Knowledge Summary Reports
- CCP LLNL WSPFs
- CCP AK Assessments
- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-CM-013, *CCP Transportation Flammable Gas Analysis (FGA) Equipment Description*
- CCP-HSP-014, *CCP Health and Safety Program Implementation*
- CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*

- CCP-PO-045, *CCP Waste Management Field Observation*
- CCP-PO-048, *CCP/LLNL Interface Document*
- CCP-PO-026, *CCP Configuration Management*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-018, *CCP Management Assessment*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- CCP-TP-048, *CCP NDA System Data Reviewing, Validating, and Reporting Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-077, *CCP Calibrating the Mobile ISOCS Large Container Counter Using NDA 2000.*
- CCP-TP-083, *CCP Gas Generation Testing*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-087, *CCP Scale Operations*
- CCP-TP-113, *Standard Contact-Handled Waste Visual Examination*
- CCP-TP-202, *CCP Operating the Segmented Gamma Scanner Using NDA 2000*
- CCP-TP-203, *CCP Calibrating the Segmented Gamma Scanner Using NDA 2000*

NOTE

Examples of CP may include, but are not limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

Upon receipt of a document listed the SMR/Designee will ensure the document is reviewed by CP responsible for the waste management activities relevant to the scope of the document.

4.21.5 As warranted, the SMR/Designee will provide written comments to CCP using Document Review Record (DRR) in accordance with CCP-QP-010.

4.21.6 CCP, at its discretion, may request objective evidence to support the competency of Host site reviewers.

4.21.7 The CCP SPM will confirm that the LLNL SMR/Designee written comments are resolved with the LLNL SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.21.8 The following documents will be sent to the SMR as “Notify Only” during the review process:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-006, *CCP Conduct of Operations Matrix*
- CCP-QP-002, *CCP Training and Qualification Plan*

- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-TP-001, *CCP Project Level Data Validation and Verification*
- CCP-TP-005, *CCP Acceptable Knowledge Documentation*
- CCP-TP-058, *NDA Performance Demonstration Program*
- WP 15-GM1002, *Integrated Issues Management*
- CCP-TP-077, *CCP Calibrating the Mobile ISOCS Large Container Counter Using NDA 2000*

4.21.9 The following documents are controlled by DOE/CBFO. Upon CCP receiving notification of revision, CCP shall notify the SMR:

- DOE/WIPP 02-3183, *CH Packaging Program Guidance*
- DOE/WIPP 02-3184, *CH Packaging Operations Manual*
- DOE/WIPP 02-3185, *CH Packaging Maintenance Manual*
- DOE/WIPP 06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*

4.22 Documents

4.22.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, formal correspondence, or as requested by SPM or SMR. Documents identified as QA records will be transmitted via CCP-QP-008, *CCP Records Management*.

4.22.2 Documents/Electronic Data to be provided to LLNL by CCP include:

- [A] List of equipment requiring calibration.
- [B] Electronic NCR data and copies of Issue Notices, as applicable.
- [C] Copies of all NDA BDRs. If NDA results meet the identified safety basis notification criteria, notifications shall be made

| in accordance with Section 4.10.2.

- [D] Copies of AK Summary Reports.
- [E] Data Quality Objective Reconciliation Documentation, as requested by LLNL.
- [F] Cross-reference of containers to BDRs, as requested by LLNL.
- [G] MSDS/SDS.

4.22.3 Documents to be provided to CCP by LLNL include:

- [A] Copies of calibration certifications.
- [B] Documentation of training completion for CCP personnel for training received from LLNL.
- [C] Documentation of information for container modifications.
- [D] AK source documentation requested by CCP.
- [E] Radiological dose rate and surface contamination results on waste containers as needed to support WWIS/WDS data entry.
- [F] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to characterization activities.
- [G] Copies of the Uniform Hazardous Waste Manifest, bill of lading, and Shipment Notifications.
- [H] Quarterly notifications that the IWMDLs have been reviewed. Revisions to IWMDLs may serve to meet the quarterly SMR notification requirement.

4.23 Authorization Basis (AB) and Configuration Management

4.23.1 The LLNL has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved LLNL DSA.

4.23.2 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with CCP procedures that protect the personnel, public, and environment.

- 4.23.3 For CCP-provided equipment, CCP will provide the documentation necessary for LLNL to perform the evaluation against its safety analysis. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and LLNL.
- 4.23.4 For LLNL-provided equipment, CCP will review operational documentation to ensure the safety of CCP personnel while operating the equipment.
- 4.23.5 All changes to equipment operated by CCP will be controlled by the LLNL Work Control Program to ensure appropriate LLNL AB evaluations are conducted, and associated controls established.
- 4.23.6 CCP has primary responsibility to ensure changes to equipment are in accordance with CCP-CM-001.

4.24 Notification

- 4.24.1 The LLNL has primary responsibility to notify CCP prior to changes in the LLNL facilities used by CCP for characterization activities or changes that may impact operations.
- 4.24.2 The LLNL has primary responsibility to notify CCP when there are changes to policies, processes, or procedures that may affect CCP characterization activities or operations.
- 4.24.3 CCP has primary responsibility to notify the LLNL prior to configuration changes to CCP or CCP vendor-owned equipment.
- 4.24.4 The LLNL has a responsibility to notify CCP when repairs or modifications are needed on CH transportation trailers or packaging equipment.
- 4.24.5 CCP is responsible for performing or coordinating repairs and modifications to CH transportation trailers or packaging equipment.

4.25 Procurement

- 4.25.1 LLNL is shown as a supplier of procurement services on the NWP QSL. LLNL may procure, inspect, and perform receipt inspection of whatever items are listed in the most current NWP QSL for the CCP scope of work. LLNL will perform these activities in accordance with its QSL-accepted program.

- 4.25.2 LLNL shall use the specifications found on the CCP sftp site when ordering gas standards used for FGA operations.
- 4.26 Occurrence Reporting and Processing System (ORPS) and Price-Anderson Amendments Act (PAAA)
- 4.26.1 CCP, through NWP established programs, maintains the responsibility for reporting potential PAAA issues resulting from the certification and transportation of TRU waste by CCP. This includes any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP at the LLNL.
- 4.26.2 LLNL maintains the responsibility for reporting potential PAAA issues resulting from concerns with safe operation of CCP characterization activities (e.g., Radiation Safety, IS&H, Industrial Hygiene, Maintenance, Lockout/Tagout, Conduct of Operations, etc.) at the LLNL. This includes filing any ORPS reports resulting from issues with safe operations of CCP characterization activities at the LLNL.
- 4.26.3 Both the LLNL and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operations of characterization activities by CCP at the LLNL.
- 4.26.4 Both the LLNL and CCP shall invite the other to participate in the investigation of any waste characterization event that results in an ORPS or PAAA report.
- 4.26.5 Both the LLNL and CCP shall support and participate in investigations when CCP characterization activities result in an ORPS or PAAA report.
- 4.27 10 Code of Federal Regulation (CFR) Part 851, Worker Safety and Health Program
- 4.27.1 CCP personnel will work under the Host site 10 CFR, Part 851, *Worker Safety and Health Program*, regulations and applicable procedures governing the Host site program.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP will be maintained in accordance with CCP-QP-008 and dispositioned in accordance with CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.
- 5.3 LLNL will maintain the following records in accordance with Host site requirements. The list includes, but is not limited to, the following:
 - [A] MSDS/SDS
 - [B] Calibration Certifications

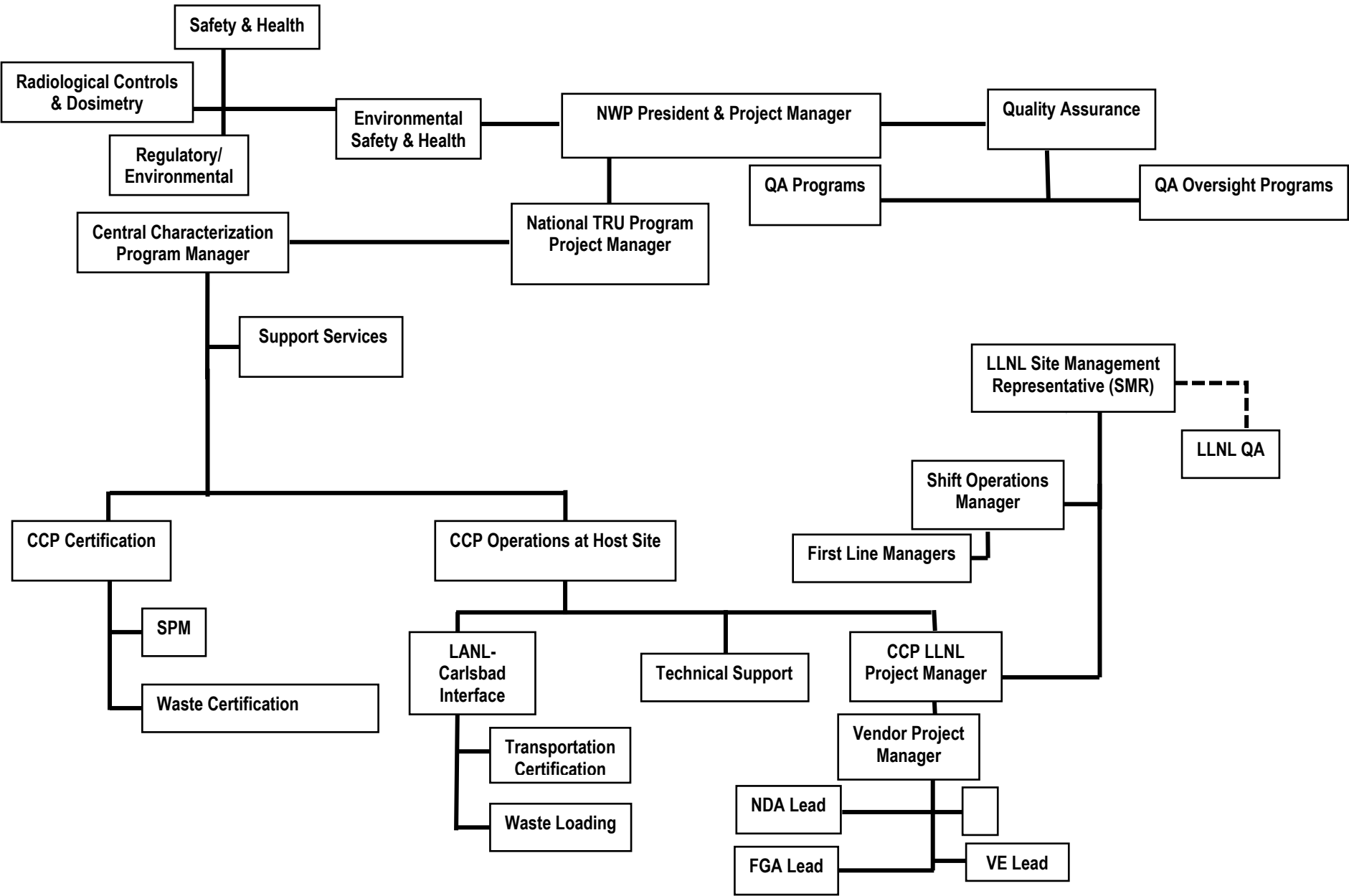
6.0 OVERSIGHT

NOTE

Through the SOW between LLNL and NWP, the LLNL has delegated the authority to characterize and certify TRU waste to be shipped to the WIPP. Nonetheless, the LLNL retains the responsibility for proper disposal as the waste generator on behalf of DOE. Accordingly, the following actions will define level of oversight of the CCP by LLNL personnel.

- 6.1 The LLNL will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the LLNL is fully compliant with waste disposal requirements as set forth in the CH WAC and WAP.
- 6.2 Following successful completion of the CBFO certification audit, the LLNL QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with LLNL QA procedures.
- 6.3 The LLNL QA will provide copies of its surveillance reports to the CCP SPM. The CCP SPM and NWP QA will take the following actions:
 - [A] Review the LLNL surveillance reports for any finding or other deficiencies against the CCP scope of work.
 - [B] Document and perform corrective actions in accordance with applicable NWP issued management procedures.
 - [C] Provide LLNL QA with CCP actions to correct the identified deficiencies.
 - [D] NWP QA will maintain an information file of the LLNL surveillance reports conducted on the CCP scope of work.

Figure 1. Nuclear Waste Partnership – CCP at LLNL



CCP-PO-024

Revision 20

CCP/INL Interface Document

EFFECTIVE DATE: 06/23/2021

Daniel Wade

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	10/25/2004	Initial issue.
1	02/23/2005	Revised based on the Implementation Plan for CCP Characterization Operations Improvements.
2	04/12/2005	Revised to incorporate changes for legacy debris waste.
3	04/29/2005	Revised to incorporate Host facility organizational changes.
4	03/14/2006	Revised to incorporate clarification of reporting and transportation requirements.
5	11/16/2006	<p>Revised to clarify and strengthen the radiological reporting requirements of this interface document and to specify the use of the on-line headspace gas analysis system for transportation flammable gas analysis. Added new Sections 4.20 and 4.21.</p> <p>Revised to implement the Waste Isolation Pilot Plant Hazardous Waste Facility Permit requirements resulting from the Section 311/Remote-Handled (RH) Permit Modification Request (PMR). Addressed Carlsbad Field Office (CBFO) Document Review Record (DRR) comments.</p>
6	05/15/2007	Revised to clarify Authorization Basis and Configuration Management requirements and to add direct-loaded standard waste boxes (SWBs). Revised to incorporate several freeze-file items provided by the Advanced Mixed Waste Treatment Project (AMWTP) during the previous revision.
7	01/04/2008	Revised to incorporate the implementation of the Central Characterization Project (CCP) Transportation Certification program at Advanced Mixed Waste Treatment Project (AMWTP).
8	07/07/2008	Revised to add guidance from the Packaging documents available through the U.S. Department of Energy (DOE) and realign operational procedures for Host site review. Revised process for managing nonconforming drums. Minor editorial changes made.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
9	03/16/2009	Revised in response to Corrective Action Report (CAR) CAR-INL-0006-08, and to add guidance concerning container segregation, use of Host site measuring and test equipment (M&TE), and Host site training.
10	12/29/2010	Minor revision to update references to the <i>Waste Isolation Pilot Plant Hazardous Waste Facility Permit</i> .
11	07/18/2011	Revised segregate documents which are required to be approved by each program and address any editorial corrections needed.
12	10/01/2012	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes and incorporated freeze file changes.
13	11/02/2012	In response to CAR-LANL-0003-12, revised to clarify roles associated with providing measuring and testing equipment (M&TE) Certificates of Calibration to Central Characterization Program (CCP).
14	06/28/2013	Revised to remove all instances of real-time radiography (RTR), to make changes referencing quality assurance (QA), and to incorporate the Class 2 permit modification approved by New Mexico Environment Department (NMED) on March 13, 2013.
15	03/30/2015	Revised to change measurement error in Section 4.5.2, to two standard deviations to comply with EDF0034 implementation at Advanced Mixed Waste Treatment Project (AMWTP). Revised to also incorporate the changes for CCP-SO-107, Rev.1, to update the organizational chart, and to add WP 13-1, <i>Nuclear Waste Partnership LLC Quality Assurance Program Description</i> , to the list of the procedures section.
16	07/19/2016	Revised to update interface to align with the modified scope for Transportation related activities. Characterization activities were removed from the interface along with responsibilities of the Radioactive Waste Management Complex. The interface was also revised to format the interface to align with CCP-PO-043, <i>CCP Interface Document Preparation</i> .
17	05/17/2018	Revised to delete 4.22.2 and 4.24.13. Removed reference to CCP-QP-040, <i>Support Training</i> , to comply with Standing Order CCP-SO-127.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
18	12/12//2019	Minor revision to correct Section 3.2.1 [D] to refer reader to 4.3 for training rather than 4.1.
19	05/07/2020	Revised to correct Section references to refer the reader to the correct locations. Revised also to incorporate DOE/WIPP-01-3194, <i>CH TRUCON</i> and the DOE/WIPP-11-3384, <i>CBFO Approved Filter Vents</i> to Section 4.13.9.
20	06/23/2021	Minor Change – Updating title of WP 15-GM1002 <i>Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.

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1.0 PURPOSE

This document establishes the interfaces between the Central Characterization Program (CCP) and Fluor Idaho LLC at the Radioactive Waste Management Complex/Advanced Mixed Waste Treatment Project (RWMC/AMWTP). This Interface Document, subordinate to the upper-tier agreement, defines the interfaces between CCP and Fluor Idaho LLC and details how the services described in the Statement Of Work (SOW) are to be executed.

The CCP is a mobile program designed to characterize, certify, and transport transuranic (TRU) waste from various U.S. Department of Energy (DOE) sites to the Waste Isolation Pilot Plant (WIPP) in Carlsbad, New Mexico. The CCP is operated by Nuclear Waste Partnership (NWP), at the direction of the DOE Carlsbad Field Office (DOE-CBFO).

1.1 Scope

CBFO has deployed a portion of the CCP to the RWMC/AMWTP, located at the Idaho National Laboratory (INL). CCP has been deployed to this site to perform transportation related activities for both the legacy TRU waste currently in storage at the RWMC/AMWTP and the newly generated TRU waste being retrieved as part of the Radioactive Waste Management Complex/Accelerated Retrieval Project (RWMC/ARP).

These services will be performed with CCP and/or Host site equipment using appropriate DOE-CBFO certified procedures. Services provided by CCP comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC); *Contact-Handled Transuranic Waste Authorized Methods for Payload Control* (CH-TRAMPAC); *Waste Isolation Pilot Plant Hazardous Waste Facility Permit*, *Waste Analysis Plan* (WIPP-WAP), Host site safety basis requirements; and permit requirements, including those pertaining to waste disposal and transportation. This work will be performed under a DOE-CBFO certified quality assurance (QA) program that meets the requirements defined in the DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document*.

Throughout this document, the Host site contractors' responsibilities are limited to the specific CCP activities being conducted within their facilities.

CCP has responsibility for transportation activities as defined in the SOW. CCP will provide Flammable Gas Analysis (FGA), Gas Generation Testing (GGT), data validation and verification, waste certification, transportation certification, contact-handled (CH) Packaging operations, and WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry. RWMC/AMWTP personnel may augment CCP transportation activities, as long as work is performed in accordance with CCP and/or DOE-CBFO certified procedures.

The Host site has primary responsibility for safety (including Radiological Control, Emergency Management, Industrial Safety [IS], Industrial Hygiene [IH], Fire Protection Program [FPP], security, safety basis, and environmental permits). This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP co-Permittees.

This document addresses CCP and Fluor Idaho LLC responsibilities associated with TRU waste transportation activities including interface requirements for the following areas:

- Safety Programs
- Training and qualification
- Deficiencies and nonconformance's
- GGT
- FGA
- Reporting requirements, as applicable
- Acceptable Knowledge (AK)
- Data validation and verification
- Measuring and Test Equipment (M&TE)
- Work standards
- QA
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- Waste Certification and WWIS/WDS Data Entry
- Transportation

The Fluor Idaho LLC reports conditions or concerns that have or may have safety, health, QA, security, operational, or environmental implications to the Department of Energy-Idaho (DOE-ID). CCP reports their similar issues to the Fluor Idaho LLC and to DOE-CBFO.

2.0 REQUIREMENTS

This document implements the applicable requirements of the following:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document (QAPD)*
- WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*
- PDD-851, 10 CFR 851, *Worker Safety and Health Program*
- PLN-260, *ICP Radiation Protection Program*

A more comprehensive list of documents included in the CCP System of Controls is identified in Section 4.13.7 and Section 4.13.8.

3.0 RESPONSIBILITIES

CCP has primary responsibility for transportation related activities in accordance with governing requirements described herein. CCP transportation related activities include FGA, GGT, WWIS/WDS data entry, and CH packaging activities.

The Fluor Idaho LLC responsibilities and CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host facility/generator documents provided to CCP.

3.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Subcontractor Technical Representative (STR)/Site Management Representative (SMR)/Designee, who will coordinate facility, QA, TRU Programs, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site safety basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities, as needed, to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures or processes.
- [D] Mobilization of staff.
- [E] Mobilization of equipment and supplies, as appropriate.

3.2 CCP Operations

3.2.1 CCP is responsible for the following activities to support Operations:

- [A] Performing system start-up and calibration of CCP-operated equipment at the Host site.
- [B] Performing safety walk-downs and management assessments.
- [C] Responding to and resolving assessment and surveillance findings for CCP Operations activities.

- [D] Ensuring CCP and Host site personnel are trained and qualified in accordance with the requirements specified in Section 4.3.
- [E] Successful completion of all applicable DOE-CBFO assessments.

3.2.2 The Host site provides the following support for CCP activities:

- [A] Radiological controls required to support activities in Host facilities, including:
 - Radiological postings.
 - Radiation protection surveys for contamination and radiation, both initial and routine, on equipment and approved survey reports to the CCP INL Project Manager (PM)/Designee, as required.
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source-checked survey instrumentation, as required.
 - Work Control documents to support CCP activities.
 - Bioassay sample collection, evaluation, and reports.
- [B] Adequate heated storage space, as needed, for GGT.
- [C] Site-specific training required to support activities in Host facilities.
- [D] IS, IH, FPP support and oversight.
- [E] Fire Protection and Emergency Management support.
- [F] Safety basis oversight, including Unreviewed Safety Question (USQ) evaluations.
- [G] Environmental impact oversight and support.
- [H] Container handling, inventory control, segregation, and storage location tracking.

[I] Personnel to be trained and qualified under the CCP program, as needed, to support CCP activities, such as, Transportation Certification, CH Packaging operations, and procurement.

[J] Maintenance support activities, as needed.

3.3 CCP INL Project Manager (PM)

3.3.1 Functions as CCP's primary interface and point-of-contact (POC) between CCP and the STR/SMR/Designee for transportation related activities.

3.3.2 Ensures CCP and Host site personnel are trained and qualified to perform WIPP-compliant TRU waste transportation activities.

3.3.3 Confirms sufficient equipment is available to perform the required activities at the Host site.

3.3.4 Provides status on CCP operations to the STR/SMR/Designee, as requested.

3.4 CCP Site Project Manager (SPM)

3.4.1 Review FGA batch data reports (BDR's) and GGT Data

3.5 NWP Quality Assurance Engineer (QAE)/Designee

3.5.1 Functions as CCP's primary interface and POC for QA matters between CCP, Host site, and DOE-CBFO.

3.5.2 Validates the Nonconformance Reports (NCRs) generated by CCP personnel performing activities at the Host site, per CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.

3.5.3 Provides copies of NCRs or Issue Notices at initiation and upon closure for information to the STR/SMR/Designee per Section 4.6 requirements.

3.5.4 Ensures that NCRs or Issue Notices are dispositioned in a timely manner in accordance with CCP-QP-005 and/or WP 15-GM1002, *Integrated Issues Management*.

3.5.5 Ensures receipt inspections of procured items and services are performed in accordance with CCP-QP-026, *CCP Inspection*

Control, and coordinated with Host site personnel.

3.5.6 Reviews required CCP software QA per CCP-QP-022, *CCP Software Quality Assurance Plan*.

3.6 CCP Vendor Project Manager (VPM)

3.6.1 Functions as CCP's primary interface and POC between CCP and Host Site STR/SMR/Designee for field operations.

3.6.2 Obtains Host facility management daily release/approval prior to performing CCP operations.

3.6.3 Provides daily pre-operations briefing.

3.6.4 Ensures that in-process documents are transmitted to the CCP Project Office as soon as practicable per CCP-QP-008, *CCP Records Management*.

3.6.5 Ensures applicable Safety Data Sheets (SDS) are maintained, available to support operations, and have been approved by and provided to the Host site STR/SMR/Designee.

3.6.6 Provides oversight of CCP field operations to ensure safe, efficient operations.

3.6.7 Supervises day-to-day CCP TRU waste transportation related activities.

3.6.8 Notifies the CCP PM, Host Site Production Planning Manager, Plant Shift Manager, Nuclear Facility Manager, and the STR/SMR/Designee of any abnormal events associated with safe operation of CCP activities, for reporting purposes.

3.6.9 Works in conjunction with Host site operations organization to establish and maintain scheduled throughput of waste containers/drums.

NOTE

This applies to steps 3.7 and 3.7.1. Only applicable if CCP is performing waste characterization (e.g., AK, nondestructive examination [NDE], nondestructive assay [NDA]).

3.7 Acceptable Knowledge Expert (AKE)

3.7.1 Ensures CCP has obtained necessary container information prior to characterization.

3.8 CCP Waste Certification Official (WCO)

3.8.1 Creates and certifies Overpack containers in WWIS/WDS.

[A] Provides Overpack builds list to RWMC/AMWTP Production Planning for mining and delivery to CCP CH Packaging operations for Overpack assembly.

[B] Certifies Overpack containers in WWIS/WDS for disposal at the WIPP.

3.9 Transportation Certification Official (TCO)

3.9.1 Provides oversight to RWMC/AMWTP Operations personnel for payload and Overpack assembly.

3.9.2 Creates and verifies payload container(s) list(s) to RWMC/AMWTP Production Planning for moving and delivering to CCP and CH Packaging Operations for payload assembly (e.g., seven packs, 14 packs).

3.9.3 Certifies payloads for transportation to and disposal at the WIPP.

3.9.4 Provides oversight to RWMC/AMWTP operations for TRUPACT/HalfPACT loading.

3.9.5 Builds payloads from certified containers and overpacks provided by RWMC/AMWTP Waste Certification Officials (WCOs) and CCP WCOs in WWIS/WDS.

3.9.6 Builds shipments from approved payloads in WWIS/WDS.

3.9.7 Provides peer review of shipment file paperwork, including screening of Trackwise for NCRs.

- 3.9.8 Provides information and paperwork to RWMC/AMWTP shippers for manifesting, marking, and labeling of TRUPACT/HalfPACT shipments to the WIPP.
- 3.9.9 Ensures Los Alamos National Laboratory (LANL) mobile loading unit personnel and Host site personnel are trained and qualified to perform WIPP compliant CH TRU waste packaging and loading operations at the Host site prior to commencement of work activities.
- 3.10 Host Site Subcontract Technical Representative (STR)/Site Management Representative (SMR)/Designee (Host Site Management Position)
 - 3.10.1 Ensures cognizant Host facility and generator POCs/Subject Matter Experts (SMEs) are identified and available as necessary to support the review of CCP documents.
 - 3.10.2 Coordinates review, provides comments, and approves comment resolution on documents. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*. Host site will complete their review in accordance with their program and submit comments to CCP document services. CCP will record their comments in accordance with CCP-QP-010.
 - 3.10.3 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste pertaining to CCP Acceptable Knowledge (AK) documents.
 - 3.10.4 Functions as the Host site primary interface and POC between the Host site's organizations and CCP's INL PM and Vendor Project Manager (VPM).
 - 3.10.5 Ensures that the RWMC/AMWTP Facility Modification Process is complete and the USQ process is complete, including approval by the appropriately-qualified facility personnel as required, for proposed modifications to CCP hardware, software, or procedures prior to CCP implementing the proposed modification.
 - 3.10.6 Ensures needed site infrastructure support, such as radiological safety and IS, IH, FPP, is available for CCP transportation activities and CH Packaging operations.

- 3.10.7 Ensures documentation of completed Host site-specific training is provided to CCP Training per Section 4.3.2.
- 3.10.8 Ensures that periodic surveillances of CCP operations by the Host site are conducted and reported to CCP.
- 3.10.9 Distributes the CCP documents listed in Section 4.13.7 and Section 4.13.8 to Host site reviewers as required by the Host site administrative controls.
- 3.10.10 Provides facilities, construction services, utilities, phone services, office services, and supplies, as appropriate.
- 3.10.11 Provides RWMC/AMWTP NCRs and/or Issue Notices to CCP VPM or designee, if NCRs and/or Issue Notices are generated on RWMC/AMWTP waste containers after certification.
- 3.10.12 Ensures the data packages required for transportation activities under CCP's program are sent to CCP Records after data generation level validation is completed, if applicable.

3.11 Host Site Operations

- 3.11.1 Ensures containers identified for transportation activities of CH Packaging operations are provided.
- 3.11.2 Performs container structural integrity checks per Host site procedures for Host site waste being provided to CCP for transportation activities and ensures that data on direct-loaded standard waste boxes (SWBs), 55/85-gallon drums, and 100-gallon drums is provided to CCP prior to FGA or GGT evolutions.
- 3.11.3 Provides oversight of CCP field operations to ensure safe, efficient operations.
- 3.11.4 Ensures certified containers selected for payloads/shipping are ONLY retrieved from the clearly identified and designated holding area.

3.12 Host Site Line Management

- 3.12.1 The Host site will provide line management authority through assigned shift supervisor, plant shift managers, and Production Planning managers to Host site personnel to ensure FGA, GGT, and CH Packaging operations under CCP procedures are

adequately conducted to support the Host site transportation schedule.

- [A] Responsible for the day-to-day assignment of a sufficient number of qualified Host site personnel to augment operations under CCP procedures to meet CH shipment commitments.
- [B] Provides work authorization and release in accordance with Host site policies and procedures for FGA, GGT, and CH Packaging operations.
- [C] Acts as the direct line of communication to Host site support organizations and services in support of FGA, GGT, and CH Packaging operations.

3.13 RWMC/AMWTP Waste Certification Official (RWMC/AMWTP WCO)

- 3.13.1 Interfaces with CCP Transportation Certification Officials (TCOs) to provide containers certified for disposal at the WIPP.
- 3.13.2 Enters RWMC/AMWTP containers requiring a FGA or GGT data review in pre-subcert in WWIS/WDS for certification.
- 3.13.3 After CCP review and verification of FGA or GGT data, RWMC/AMWTP WCOs will certify containers for WWIS/WDS entry.

4.0 INTERFACE

4.1 Initial Setup for Operations

4.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host site STR/SMR/Designee, who will coordinate facility, QA, and ES&H reviews to determine satisfactory compliance with Host site safety basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures and processes.
- [D] Mobilization of project staff and equipment.

4.2 Routine Operations

4.2.1 General Conditions of Operation

- [A] The RWMC/AMWTP has the overall responsibility for the management of the nuclear materials and operations of the nuclear facilities.
- [B] Work performed by CCP personnel (including subcontractors) will be in compliance with RWMC/AMWTP and CCP requirements.
- [C] CCP personnel will STEP BACK (Pause) or STOP WORK, as appropriate and will notify RWMC/AMWTP supervision and the CCP VPM in the event of a safety concern (e.g., Technical Safety Requirement [TSR] violation, Price-Anderson Amendments Act [PAAA] violation, breached container, emergency, injury, potential compliance violation).
- [D] CCP personnel will follow CCP-PO-005, *CCP Conduct of Operations*, for reporting employee concerns or abnormal conditions.

4.3 Training

- 4.3.1 CCP personnel or RWMC/AMWTP personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan* as applicable.
- 4.3.2 CCP and RWMC/AMWTP personnel assigned to field operations must complete the RWMC/AMWTP-specific training. The STR/SMR will ensure the RWMC/AMWTP-specific training requirements and documentation are sent to CCP Training.
- 4.3.3 Both the CCP training and RWMC/AMWTP-specific training must be completed prior to the individual being assigned to perform independent work at the RWMC/AMWTP.
- 4.3.4 Administrative work, such as BDR reviews requiring no access to the characterization activities or processes at the RWMC/AMWTP, may be completed by personnel who have not completed the required RWMC/AMWTP-specific training. Personnel who have not completed RWMC/AMWTP-specific training will not be allowed unescorted access.
- 4.3.5 A List of Qualified Individuals (LOQI) will be monitored by the CCP VPM to confirm CCP and RWMC/AMWTP personnel assigned to perform work are qualified.

4.4 Employee Monitoring

- 4.4.1 CCP employees will be monitored in accordance with Host site radiation protection program.
- 4.4.2 CCP employee health and safety will be monitored by Host site Health and Safety program in accordance with 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program* (WSHP).
- 4.4.3 CCP personnel will participate in the Host site bioassay program. CCP personnel will provide samples, as requested, under the routine/random program established by the Host site. CCP personnel will submit the bioassay samples required to establish a baseline for activities at the Host site.

- 4.4.4 The CCP INL PM or VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.
 - 4.4.5 Host site radiological controls personnel will perform routine surveys for contamination and radiation as specified in Host site policies or procedures. The CCP INL PM, or VPM, and appropriate Host site management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied buildings or any of the CCP equipment contained in these buildings. Access to and copies of routine survey results will be made available to CCP upon request.
 - 4.4.6 The Host site will immediately notify the CCP INL PM or VPM, and appropriate Host site management personnel of any abnormal continuous or fixed air sample filter analysis results from any area routinely occupied by CCP personnel.
- 4.5 Container Management
- 4.5.1 The Host site is responsible for container movement, segregation, and storage.
 - 4.5.2 The Host site will provide the dose rate and surface contamination information necessary to certify container(s) for disposal.
 - 4.5.3 Host site will provide the required information to CCP when the Host site requests CCP to perform activities of non-CCP waste.
 - 4.5.4 The Host site is responsible for providing documented information to the CCP PM for any modification to containers after original container closure and/or AK has been completed.
 - [A] The CCP Site Project Manager (SPM)/Designee will review the documented information of modified containers and will correct/change/modify CCP data, as necessary.

4.6 Deficiencies and Nonconformances

4.6.1 CCP Identified Deficiencies and Nonconformances

NOTE

The Quality Assurance Engineer (QAE) will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If CCP personnel identify a nonconformance condition associated with a waste container during the CCP characterization and certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] If the deficiency or nonconformance is resolved by CCP, CCP will ensure appropriate closure of the deficiency in accordance with CCP-QP-005.
- [C] If a container with an NCR is provided to the Host site for remediation, CCP will provide the NCR documentation to the Host site STR/SMR/Designee. This information will be used by the Host site to initiate an NCR in the Host site's NCR management system. These containers shall be provided to the Host site for segregation consistent with DOE/CBFO QAPD, Section 1.3.2.4, Segregating Nonconforming Items. These containers will be managed in accordance with the Host site specific procedures and/or requirements. The Host site will not remove the CCP hold tag unless directed to do so by appropriate CCP personnel (e.g., PM, VPM, SPM, QA). After the Host site completes remediation, the container will be returned to CCP for subsequent verification of the remediation. If CCP closes an NCR on a container previously provided to the Host site for remediation, CCP will provide the NCR closure documentation to the Host site STR/SMR/Designee. This information will be used by the Host site to close the NCR in the Host site's NCR management system.
- [D] If a container with an NCR is removed from CCP's AK tracking spreadsheet to be permanently returned to the Host site, CCP will provide the NCR documentation to the Host site STR/SMR/Designee. This information will be used by the Host site to initiate an NCR in the Host site's NCR management system. The Host site will contact the CCP INL PM to remove CCP hold tags on containers which are permanently returned to the Host site.

4.6.2 Host Site Identified Deficiencies and Nonconformances

- [A] Deficiencies or nonconformances identified by the Host site during this project which affect, transportation, or certification activities shall be promptly identified to the CCP PM or VPM, who will initiate an NCR or Issue Notice in accordance with applicable CCP procedures.
- [B] The Host site will issue NCRs or Corrective Action Reports in accordance with the Host site QA Program and Procedures.

4.7 Filter Inspection/Filter Change Out

- 4.7.1 Qualified CCP Personnel will inspect container filters as part of the WIPP approved filter vents, DOE/WIPP-11-3384, *CBFO Approved Filter Vents*, and will be documented during Flammable Gas Analysis per DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*.
- 4.7.2 If required, filter change out will be performed and documented by qualified CCP personnel per CCP-TP-082, *CCP Waste Container Filter Vent Maintenance and Operation*.

4.8 Flammable Gas Analysis (FGA)

- 4.8.1 CCP will perform sampling and analysis using a gas chromatography/mass spectrometry (GC/MS) with thermal conductivity detector (TCD) in accordance with DOE/WIPP-06-3345.
- 4.8.2 CCP will be responsible for maintenance and repairs to GC/MS instrumentation.
- 4.8.3 The Host site will be responsible for maintenance and repairs for the FGA facilities.

4.9 Acceptable Knowledge (AK)

NOTE

If AK work is performed it will follow the steps below. If no AK work is performed this AK section is not applicable.

- 4.9.1 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*, and/or DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan*.
- 4.9.2 Host facility/generator personnel assist CCP AK personnel with AK collection.
- 4.9.3 CCP AK personnel and Host facility/generator personnel develop an Interface Waste Management Document List (IWMDL) for each waste stream. Each IWMDL will include facility processes, plans, and procedures that control the following waste management activities as applicable:
 - [A] Waste generating activities
 - [B] Waste retrieval activities
 - [C] Waste packaging/repackaging
 - [D] Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
 - [E] Waste inspection, testing, and characterization
 - [F] Decontamination and Decommissioning (D&D) operations
 - [G] Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP
- 4.9.4 The STR/SMR ensures POCs/SMEs are assigned to review the new or revised IWMDLs for accuracy and completeness and provide written comments as appropriate.
- 4.9.5 The AKE and Cognizant Host site/generator personnel (CP) resolve comments and questions.
- 4.9.6 SPM provides STR/SMR with the results of Acceptable Knowledge Assessments (AKA).

- 4.9.7 STR/SMR distributes results of the AKA to designated CPs for review and comment.
- 4.9.8 STR/SMR concurs with final AKA in writing.
- 4.9.9 CCP submits new or revised AK Summary Reports to the STR/SMR/Designee for review and concurrence.
- 4.9.10 The STR/SMR ensures CP review the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.
- 4.9.11 A Host facility/generator CP attends a briefing on new or revised AK Summary Reports.
- 4.9.12 Host facility/generator personnel notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to an IWMDL.
- 4.9.13 The Host facility will not provide any waste containers to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Orders, Operator Aids, etc.) used to generate, package, and/or repack the container.
- 4.9.14 The work document(s) provided to the AKE will contain the following information at a minimum:
 - [A] Identification (including revision) of the work document(s) used to generate the container
 - [B] Type of activity (e.g., packaging/repackaging only, remediation, treatment)
 - [C] Amount (estimated) and type (if known) of liquids
 - [D] Type and quantity (estimated) of absorbents used
 - [E] Type and quantity (estimated) of neutralization agents used
 - [F] Any unexpected conditions or reactions encountered
 - [G] General description of waste items
 - [H] Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)

- [I] Filter data including model and quantity used
- [J] Parent container identification

4.9.15 At a minimum of once per calendar quarter, Host facility/generator management will review current IWMDLs and provide written assurance to the CCP SPM that the list is up to date OR provide necessary documentation to revise the list.

4.10 Project Office Certification Activities

4.10.1 CCP will transmit transportation and certification data using the WWIS/WDS and procedure CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*.

4.10.2 The CCP WCO will document and certify that TRU waste payload containers meet the requirements of the TRAMPAC and submit the data to the WWIS/WDS for approval.

4.10.3 The RWMC/AMWTP WCO will document and certify that TRU waste payload containers meet the requirements of the WIPP-WAC and submit the data to the WWIS/WDS for approval.

4.10.4 CCP WCO will provide listings of containers to be overpacked, as required, to RWMC/AMWTP Production Planning and CCP Transportation via e-mail.

4.10.5 CCP Transportation will begin their loading and shipping process using payload containers approved in WWIS/WDS.

4.10.6 CCP WCO enters FGA data into WWIS/WDS

4.10.7 CCP WCO verifies FGA data in WWIS/WDS

4.10.8 CCP WCO enters GGT data into WWIS/WDS

4.10.9 CCP WCO verifies GGT data in WWIS/WDS

4.11 Transportation

4.11.1 RWMC/AMWTP will provide CH package loading equipment and personnel required to handle waste containers for Overpack container and payload assembly.

- 4.11.2 RWMC/AMWTP will provide hoisting and rigging equipment (i.e., crane, forklift, Adjustable Center-of-Gravity Lift Fixture [ACGLF]) and qualified personnel for support of Overpack container assembly, payload assembly, and CH package loading.
- 4.11.3 CCP will provide CH package and Transportation Certification training to RWMC/AMWTP personnel, as required, to maintain certifications for transportation activities.
- 4.11.4 CCP Transportation is responsible for meeting requirements for packaging TRU waste certified by RWMC/AMWTP or CCP, as approved in WWIS/WDS.
- 4.11.5 CCP Transportation will load containers into overpacks according to CCP WCO listings and will provide the CCP WCO with the necessary data to complete the process.
- 4.11.6 CCP WCO and RWMC/AMWTP WCO will work with CCP Transportation, as necessary, to complete the transportation process.
- 4.11.7 RWMC/AMWTP Shipping will provide manifesting, marking, labeling, and placarding of shipments in accordance with 40 CFR, *Protection of Environment*, and 49 CFR, *Transportation*, requirements and in accordance with site-specific procedures.
- 4.11.8 CCP will provide certification documentation to the STR/SMR/Designee for waste shipped in accordance to CCP procedures.
- 4.12 Measurement and Test Equipment (M&TE)
 - 4.12.1 CCP will follow the requirements of Material and Testing Equipment as it is outlined in CCP-QP-016, *CCP Control of Measuring and Testing Equipment*.
 - 4.12.2 For CCP M&TE that requires calibration, the CCP M&TE Custodian will follow the requirements as specified in CCP-QP-016.
 - 4.12.3 For CCP Host site M&TE furnished for use in the CCP program, the Host site STR/SMR/Designee will provide notification to the CCP M&TE Custodian when M&TE are added, deleted, or found out-of-tolerance/defective.

4.12.4 The Host site furnished M&TE will make available National Institute for Standards and Technology (NIST)-traceable calibration services for M&TE to the CCP. The Host site will maintain records on M&TE calibration in accordance with their Records Inventory and Disposition Schedule (RIDS). The Host site M&TE contact will make the Certificate of Calibration for these M&TE items available to the CCP VPM and/or the CCP M&TE Custodian prior to issuing M&TE to CCP for use, or for M&TE calibrated through a work package, within 14 work days of completion of calibration.

4.12.5 The Host site STR/SMR/Designee will make calibration documentation and processes accessible, as needed, for internal and external audits.

4.13 Procedures

4.13.1 The following documents and revisions to these documents will be provided to the STR/SMR for review by SMEs/CP:

[A] CCP IWMDL (Only required if AK work is performed by CCP)

[B] CCP AKA (Only required If AK work is performed by CCP)

4.13.2 Upon receipt of a document listed, the STR/SMR/Designee will ensure the document is reviewed by CP responsible for the waste management activities relevant to the scope of the document.

4.13.3 As warranted, the STR/SMR/Designee will provide written comments to CCP using the Document Review Record (DRR) in accordance with CCP-QP-010.

4.13.4 The CCP SPM will confirm that the STR/SMR/Designee written comments are resolved with the Host facility STR/SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.13.5 As defined in CCP-QP-010, editorial or minor changes may be made to all CCP documents except CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, CCP-PO-002, *CCP Transuranic Waste Certification Plan*, CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*, and CCP-QP-001, *CCP Graded Approach*, without the same level of review and approval as the original document. CCP will process any required changes to CCP procedures in accordance with CCP-QP-010 and will provide any

minor or editorial changes to documents to the Host site STR/SMR/Designee as "Notify Only".

4.13.6 New Technical Operating Procedures (procedures that operate equipment) developed by CCP and scheduled to be used at the Host site shall be evaluated by the Host site STR/SMR/Designee to determine if the procedure should be added to the Host site review and approval lists defined below.

4.13.7 The following documents and revisions to these documents will be provided to the STR/SMR for review by SMEs/CP. If the procedure is an operational procedure that CCP is not currently operating to, the STR/SMR may waive their review until CCP operations commence on site. When CCP operations return to the site the STR/SMR will be provided all procedures listed below for review:

- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-PO-024, *CCP/INL Interface Document*
- CCP-PO-026, *CCP Configuration Management*
- CCP-PO-043, *CCP Interface Document Preparation*
- CCP-PO-403, *CCP/AMWTP Roles and Responsibilities*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-082, *CCP Waste Container Filter Vent Maintenance and Operation*
- CCP-TP-083, *CCP Gas Generation Testing*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-140, *CCP Equipment Maintenance*

- CCP-HSP-014, *Health and Safety Program Implementation for CCP*

4.13.8 The following documents, revisions to these documents, and all minor changes to these documents will be provided to the Host site STR/SMR/Designee as "Notify Only":

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*
- CCP-PO-401, *CCP Contact-Handled Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC) For Intersite Shipments*
- CCP-QP-001, *CCP Graded Approach*
- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-QP-014, *CCP Quality Assurance Trend Analysis and Reporting*
- CCP-QP-015, *CCP Procurement*
- CCP-QP-016, *CCP Control of Measuring and Testing Equipment*
- CCP-QP-022, *CCP Software Quality Assurance Plan*

- CCP-QP-026, *CCP Inspection Control*
- CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*
- CCP-QP-030, *CCP Written Practice for the Qualification of CCP Helium Leak Detection Personnel*
- CCP-TP-001, *CCP Project Level Data Validation and Verification*
- CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*
- CCP-TP-027, *CCP Notifications for Intersite Shipment of Characterized CH TRU Waste*
- CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*
- WP 15-GM.02, *Worker Safety and Health Program Description*
- WP 15-GM1002, *Integrated Issues Management*

4.13.9 The following documents are controlled by DOE/CBFO and, upon CCP receiving notification of issuance/revision, CCP shall notify the Host site for purposes of USQ screening:

- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-02-3184, *CH Packaging Operations Manual*
- DOE/WIPP-02-3185, *CH Packaging Maintenance Manual*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-01-3194, *CH TRUCON*
- DOE/WIPP-11-3384, *CBFO Approved Filter Vents*

4.13.10 CCP will maintain control of procedures listed in Sections 4.13.7 and 4.13.8 in accordance with CCP-QP-010.

4.13.11 The Host site STR/SMR/Designee will review or designate the appropriate reviews of the CCP procedures listed in Section 4.13.7, and forward written comments to CCP Document Services per CCP-QP-010, for resolution.

4.13.12 The CCP SPM will confirm that the Host site STR/SMR/Designee written comments are resolved with the Host site STR/SMR/Designee concurrence prior to proceeding with CCP operations.

4.14 Document/Records Transmittals

4.14.1 Documents listed in this Section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as quality records will be transmitted via CCP-QP-008.

4.14.2 Documents to be provided to the Host site STR/SMR/Designee by CCP include:

- [A] List of equipment requiring calibration
- [B] Copies of NCRs and Issue Notices, at initiation and/or closure, as requested
- [C] Copies of semi-annual trending summary reports
- [D] Copies of QA surveillance reports
- [E] Copies of FGA and GGT BDRs, as requested
- [F] Information on chemical usage and copies of applicable SDSs, as requested for inventory or reporting reasons
- [G] Copies of training requirements and associated training records for Host site personnel supporting CCP
- [H] A copy of the RIDS developed by CCP
- [I] CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- [J] CCP-PO-002, *CCP Transuranic Waste Certification Plan*

- [K] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/Department of Environmental Quality/Environmental Protection Agency (EPA) or other regulatory audit or compliance/enforcement actions that may impact its ability to characterize and transport TRU waste
- [L] Copy of final data package to the WIPP via WWIS/WDS, as requested
- [M] NMED and EPA approval of the DOE-CBFO Certification Audit Report
- [N] Copy of completed shipment documentation packages

4.14.3 Documents to be provided to CCP by Host site include:

- [A] Documentation of required training
- [B] Documentation of training completion for CCP and Host site personnel for training received from the Host site
- [C] Radiological dose rate and surface contamination results on waste containers, as needed to support WWIS/WDS data entry
- [D] Radiological information as described in this document
- [E] Copies of NCRs, deficiency reports, or other nonconformance documentation; as applicable
- [F] Copies of the results of Host site internal and external assessments and audits pertaining to CCP
- [G] Copies of calibration certifications, as requested
- [H] Copies of QA surveillance reports pertaining to CCP
- [I] Results of any exposure sampling performed for CCP personnel by the Host site.
- [J] Copies of PDD-851, 10 CFR 851, *Worker Safety and Health Program*

[K] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to transportation related activities

[L] Copies of BDR's as requested

4.15 Procurement

4.15.1 Items and services to be purchased under CCP-PO-001, will be graded by CCP in accordance with CCP-QP-001 and coordinated with the Host site. The grading will determine whether the items and services are quality-affecting (Quality Level 1 or Quality Level 2) or non-quality-affecting (Quality Level 0) for WIPP certification and transportation. Procurements must be in compliance with Host site 851 WSHP and process safety management requirements.

[A] CCP, in coordination with the Host site, will procure, receive, and inspect quality-affecting items and services in accordance with CCP-QP-015, *CCP Procurement*. These items and services are the sole responsibility of CCP with regard to their quality integrity. Additionally, CCP quality-affecting software shall be procured in accordance with CCP-QP-022.

[B] CCP, in coordination with the Host site, will procure non-quality-affecting items and services per CCP-QP-015, using a graded approach for WIPP certification and transportation.

[C] Items and services that are **NOT** related to safe operation of the facility, and which do **NOT** affect WIPP characterization, certification, and transportation, are not required to be graded by CCP or the Host site.

[D] Receipt inspection of quality-affecting items will be performed by personnel trained and qualified to CCP-QP-002.

4.16 Quality Assurance (QA)

4.16.1 Activities performed in the completion transportation work scope will be in compliance with applicable DOE-CBFO-certified CCP procedures.

4.16.2 CCP will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.

4.16.3 The Host site will conduct audits/surveillances to assess compliance with applicable procedures.

4.17 Safety Basis and Configuration Management (CM)

4.17.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved, Host site documented safety analysis.

4.17.2 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with Host site procedures that protect the personnel, public, and environment.

4.17.3 For CCP-provided equipment, CCP will provide the documentation necessary for the Host site to perform the evaluation against its safety analysis. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and the Host site.

4.17.4 For Host site-provided equipment, CCP will review operational and safety basis documentation, including USQs, to ensure the safety of CCP personnel while operating the equipment.

4.17.5 All changes to equipment operated by CCP will be controlled by the Host site Configuration Management and Work Control Program to ensure appropriate safety basis evaluations are conducted and associated controls are established.

4.17.6 The Host site will submit all changes to safety basis requirements that affect CCP operations for review and concurrence by CCP prior to implementation.

4.18 Notification

4.18.1 The Host site has primary responsibility to notify CCP when there are changes in the Host sites equipment used by CCP for transportation activities or changes that may impact operations.

4.18.2 The Host site has primary responsibility to notify CCP when there are changes to the policies, processes, or procedures that may affect CCP transportation activities or operations.

4.18.3 CCP has primary responsibility to ensure changes to equipment are in accordance with CCP-CM-001, *CCP Equipment Change Authorization and Documentation*.

4.18.4 CCP has primary responsibility to notify the Host site when there are configuration changes to CCP or CCP vendor-owned equipment.

4.18.5 The Host site has primary responsibility to notify CCP when repairs or modifications are made to transportation trailers or packaging equipment (TRUPACT-II, HalfPACTs, etc.). NWP will then notify the appropriate Cognizant Engineer at the WIPP site. The Cognizant Engineer will verify the modification.

4.18.6 The Host site has the responsibility to notify NWP of fleet equipment issues, communicating the need and supply of payload consumables.

4.19 Work Standards

4.19.1 CCP Personnel will participate in the Host Site Integrated Safety Management System (ISMS) Program.

4.19.2 CCP operations personnel will work under the Host site Lockout/Tagout procedure.

4.19.3 CCP and Host site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste transportation activities. Host site procedures and work packages will be used for non-waste activities (e.g., equipment repairs).

4.19.4 CCP operations personnel will operate in accordance with CCP-PO-005 and appropriate Host site Conduct of Operations procedures.

4.19.5 CCP personnel will work under the Host site safety basis and work control standards, (e.g., General Employee Radiological Training [GERT]). Maintenance work control activities for CCP supplied equipment and Host site-supplied equipment will be controlled using Host site work authorization procedures.

4.19.6 As outlined in CCP-PO-005, it is the responsibility of the CCP VPM to maintain equipment configuration and authorize equipment changes to ensure that Mobile Characterization Equipment (MCE) systems are operated and maintained in accordance with the Host site safety basis. The CCP VPM will not authorize a change to any MCE until steps 4.19.6[A] and 4.19.6[B] have occurred:

- [A] The CCP INL PM has completed, signed, and dated Section E of CCP-CM-001, Attachment 1, CCP Characterization Equipment Change Authorization.
- [B] The Host site STR/SMR/Designee must concur with the proposed change in writing (e.g., CCP-CM-001, Attachment 1) and must provide a copy of an approved Host site USQ prior to implementation of the proposed changes. The Host site STR/SMR/Designee is responsible for ensuring that all Host site configuration management processes are utilized and that the proposed change is within the approved safety basis and permitting requirements for the Host site.

4.19.7 The CCP INL PM or VPM will notify the STR/SMR/Designee when new CCP personnel, NWP, and subcontractor personnel are assigned to work at RWMC/AMWTP. The CCP INL PM or VPM will notify the STR/SMR/Designee when CCP personnel, NWP, and subcontractor personnel leave the RWMC/AMWTP as a result of reassignment or resignation. This notification will occur within three to five days. The STR/SMR will notify affected organizations to support the arrival or departure of CCP personnel.

- [A] The CCP INL PM or VPM will notify the STR/SMR/Designee when CCP personnel or subcontract personnel are terminated for cause on the same day of the termination. The CCP INL PM or VPM will provide the STR/SMR/Designee with written documentation attesting to the cause(s) for termination within one day of the date of termination.

4.19.8 CCP will provide historical information on the operation of any CCP equipment deployed at the Host site for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned from other DOE sites that have CCP services performed.

4.19.9 For Host site-supplied equipment and facilities, the Host site is responsible for ensuring the safety basis is adequate to cover the equipment and facilities that are provided. For these instances the Host site is the Design Authority. It is expected that CCP will participate in review of hazards analysis for equipment and facilities being provided.

4.19.10 For non-Host site provided equipment, CCP will provide safety basis input for the Host site's safety basis. CCP will be the Design Authority for the equipment. In addition, prior to any modification of equipment, these changes will be provided to the Host site for review and incorporation into their safety basis documents and will be subject to CCP configuration management program. The programmatic limits for operation of the equipment are the responsibility of CCP as part of their Design Authority responsibilities.

4.19.11 CCP will **NOT** authorize a change to any software on transportation related equipment operated at Host site until the following has occurred:

The Host site STR/SMR/Designee must concur with the proposed change in writing and provide a copy of the approved USQ, if it is required. The Host site STR/SMR/Designee will coordinate the review of the proposed change to ensure safety basis and Permitting requirements are met.

4.19.12 The focus of these interfaces is to adequately protect the workers on the equipment at the various facilities.

4.20 Price-Anderson Amendments Act (PAAA)

4.20.1 CCP, through NWP established programs, maintains the responsibility for reporting potential PAAA issues resulting from the certification and transportation of TRU waste by CCP at INL. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP at INL.

4.20.2 The Host site maintains the responsibility for reporting potential PAAA issues resulting from issues with safe operation of CCP activities (e.g., Radiation Safety, IS, IH, FPP, Industrial Hygiene, Maintenance, Lockout/Tagout, Conduct of Operations, etc.) at INL. This includes filing any ORPS reports resulting from issues with safe operations of CCP activities at INL.

4.20.3 Both INL and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operation of transportation related activities by CCP at INL.

- 4.20.4 Both INL and CCP shall invite the other to participate in the investigation of any transportation activities that result in an ORPS or PAAA report.
- 4.20.5 Both INL and CCP shall support and participate in investigations when CCP transportation activities result in an ORPS or PAAA report.
- 4.21 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program*
 - 4.21.1 CCP personnel will work under the Host site 10 Code of Federal Regulations (CFR), Part 851, WSHP regulations and applicable procedures governing the Host site program.
 - 4.21.2 CCP, through NWP established programs, will comply with the 10 CFR 851 requirements.
- 4.22 Drum Venting
 - 4.22.1 All Drum Venting will be performed by RWMC/AMWTP.
- 4.23 Gas Generation Testing (GGT)
 - 4.23.1 CCP will perform GGT sampling and analysis using GGT canisters in accordance with CCP-TP-083, *CCP Gas Generation Testing*, and CCP-PO-016, *CCP Gas Generation Testing Quality Assurance Project Plan*.
 - 4.23.2 CCP will be responsible for maintenance and repairs of the GGT canisters and instrumentation.
 - 4.23.3 The Host site will be responsible for maintenance and repairs for the GGT facilities.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste transportation and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP documents referenced in this plan are maintained in accordance with CCP-QP-008.
- 5.3 QA records generated by CCP will be maintained and dispositioned in accordance with CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.
- 5.4 INL will maintain the following records in accordance with Host site requirements and their approved Record Retention Schedules, see below:
 - [A] M&TE Calibration Certifications

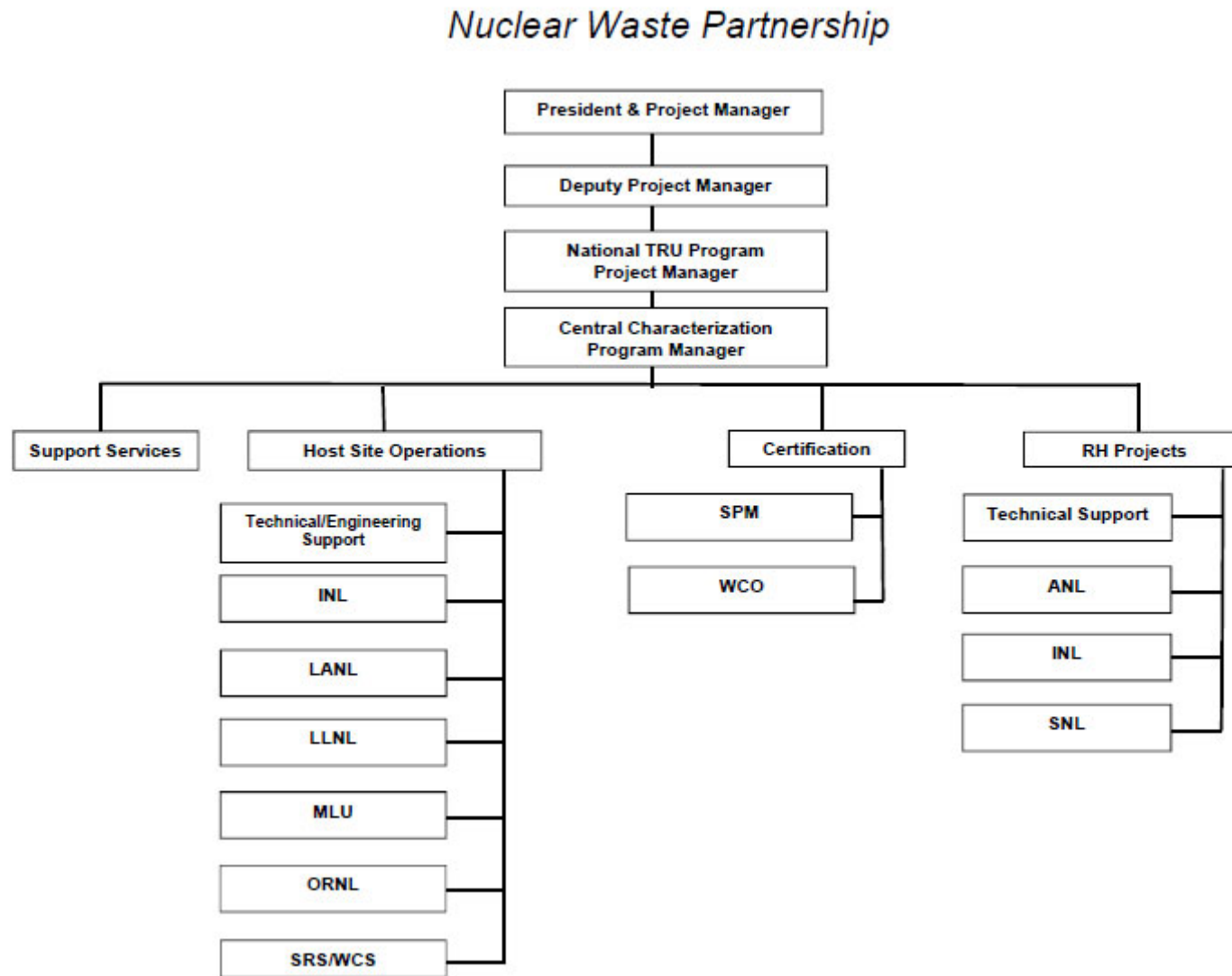
6.0 OVERSIGHT

NOTE

Through the contract between the Host site and NWP, and the associated SOW, the Host site has delegated the authority to characterize and certify TRU waste to be shipped to the WIPP. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the DOE-CBFO certification/recertification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the WIPP-WAC and WIPP-WAP. Host site conducts, at their discretion, periodic surveillances of CCP operations.
- 6.2 Following successful completion of the certification/recertification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with the Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP PM. The CCP PM and QA will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any findings or other deficiencies against the CCP scope of work.
 - 6.3.2 If required, prepare and process Issue Notices in accordance with WP 15-GM1002 for deficiencies identified during the review.
 - 6.3.3 Provide Host site QA with CCP actions to correct the identified deficiencies, as documented in the CCP Issue Notices.
 - 6.3.4 QA will maintain an information file of the Host site surveillance reports conducted on the CCP scope of work.

Figure 1. Nuclear Waste Partnership - INL



CCP-PO-501

Revision 12

CCP/INL RH TRU Waste Interface Document

EFFECTIVE DATE: 05/25/2021

Richard Kantrowitz

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	02/09/2006	Initial issue.
1	08/07/2006	Revised to add a section for Authorization Safety Basis and Configuration Management and to update certain procedures identified in the Procedures Section.
2	11/16/2006	Revised to implement the Waste Isolation Pilot Plant Hazardous Waste Facility Permit requirements resulting from the Section 311/Remote-Handled (RH) Permit Modification Request (PMR).
3	04/23/2008	Updated to include RCRA sampling and analysis and clarification of training roles and responsibilities.
4	04/30/2010	Revised to include Flammable Gas Sampling in section 4.7; section 4.19.3 to include all AK reports, CCP-TP-512 and CCP-TP-505; section 4.21 radiochemistry sampling. Added Waste Data System (WDS).
5	12/29/2010	Minor revision to update references to the <i>Waste Isolation Pilot Plant Hazardous Waste Facility Permit</i> .
6	04/03/2012	Revised to reflect Host site training requirement communication and submittal to Central Characterization Project (CCP) Training.
7	10/01/2012	Revised to incorporate the Nuclear Waste Partnership (NWP) transition changes.
8	06/21/2013	Revised to clarify roles associated with providing measuring and testing equipment (M&TE) Certificates of Calibration to Central Characterization Program (CCP). Revised to implement Permit Modification Request Class 2 approved by New Mexico Environment Department (NMED) dated March 13, 2013.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
9	02/29/2016	Revised to remove CCP-HSP-500, <i>CCP Hazard Control Plan for RH TRU Operations at INTEC</i> , and CCP-HSP-014, <i>Health and Safety Program Implementation for CCP</i> was added. Procedure CCP-TP-509, <i>CCP Remote-Handled Transuranic Container Tracking</i> , was moved to a different Section. Procedure CCP-QP-029, <i>CCP Corrective Action Management</i> , was removed and WP 15-GM1002, <i>Issues Management Processing of WIPP Forms</i> , was added. Clarified roles and additional responsibility items in Section 3.4, 3.6, 4.8, and 4.17.
10	02/08/2017	Added Section 3.4 SPM roles and responsibilities.
11	04/16/2020	Revised to correct step references based on the extent of condition review for Carlsbad Field Office (CBFO) Corrective Action Plan (CAR) 20-008. Updated referenced documents and editorial changes.
12	05/25/2021	Minor Change – updating title of WP 15-GM1002, <i>Issues Management Processing of WIPP Forms to Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.

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1.0 PURPOSE

The Central Characterization Program (CCP) is a mobile program designed to characterize, certify, and transport transuranic (TRU) waste from various U.S. Department of Energy (DOE) sites to the Waste Isolation Pilot Plant (WIPP) in New Mexico. The CCP is operated by Nuclear Waste Partnership, LLC (NWP), at the direction of the DOE/Carlsbad Field Office (CBFO).

CBFO has deployed the CCP to the Idaho Nuclear Technology and Engineering Center (INTEC) and Reactor Technology Complex (RTC), located on the Idaho National Laboratory (INL). CCP has been deployed to this site to process remote-handled (RH) TRU waste.

This Interface Document, subordinate to the upper-tier agreement, defines the interfaces between CCP and INTEC, provides details how the services described in the Statement of Work (SOW) are to be executed. This document is invoked via an Affiliate Agreement and a SOW between the Host site organization and NWP. This document is intended to clarify and expand on details contained in the SOW and program documents. It is not intended to be used in lieu of a task-specific SOW.

CCP has primary responsibility for waste characterization activities. CCP services include compilation, reporting, and confirmation of acceptable knowledge (AK), Nondestructive Examination (NDE), Radiological Characterization, visual examination (VE), Data Validation and Verification, Waste Certification, WIPP Waste Information System (WWIS) Waste Data System (WDS) Data Entry, and Waste Transportation Packaging and Shipment.

In providing these services, CCP may opt to use other CBFO-certified TRU programs. CCP will accept batch data reports (BDRs) validated through the data generation level from these other certified programs, and perform all project office activities in accordance with the CCP program.

These services will be performed with CCP and/or Host site equipment with appropriate DOE/CBFO-certified procedures. All services provided by CCP will comply with RH TRU requirements delineated in 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); and *Waste Isolation Pilot Plant Hazardous Waste Facility Permit, Waste Analysis Plan* (WAP), including those requirements pertaining to waste disposal and transportation. This work will be performed under a DOE/CBFO-certified quality assurance (QA) program that meets requirements defined in DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD).

The Host site may augment CCP characterization efforts as requested by CCP. Where required, all augmented services provided by the Host site shall comply with CCP-certified procedures.

The Host site has primary responsibility for assuring that requirements for safety, (including Radiological Control, Emergency Management, Industrial Safety, and Industrial Hygiene [IH]), security, safety basis, environmental permits, and other areas are met for CCP activities and that CCP activities support the scheduled objectives. Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP Co-Permittees.

Throughout this document the Host site contractors' responsibilities are limited to the specific CCP activities being conducted within their facilities.

The CCP will certify RH TRU waste at the INL for disposal in accordance with the certification authority that has been granted by the DOE/CBFO.

This document addresses specific requirements for the following areas:

- Training and Qualification
- Container Management
- Deficiencies and Nonconformances
- VE
- Radiological Characterization (includes dose-to-curie methodology)
- NDE
- AK
- Data Validation and Reconciliation
- Measuring and Test Equipment (M&TE)
- Work Standards
- QA
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- Waste Certification and WWIS/WDS Data Entry
- Transportation
- Authorization Safety Basis and Configuration Management
- Flammable Gas Analysis
- Real-time radiography
- Radiochemical sampling and analysis

The Host site will report conditions or concerns that have or may have safety, health, QA, security, operational, or environmental implications to the Department of Energy-Idaho (DOE-ID). CCP shall report their similar issues to the Host site and to DOE/CBFO.

1.1 Scope

This document applies to the CCP, the Host site, and generators whose waste is characterized and certified by CCP for the INTEC. Unless specifically stated otherwise, the INTEC is the Host site in this document. "Generator" may refer to the INTEC or it may refer to the facility that originally generated and/or treated and packaged the waste. This document addresses CCP Host site/generator responsibilities for the following areas:

- Facilities/equipment for TRU waste characterization and shipping
- Safety Programs
- Training and qualification
- Deficiencies and nonconformance
- Nondestructive examination (NDE) including visual examination (VE) and real-time radiography (RTR)
- Radiological Characterization (RC) including dose-to-curie (DTC) and sampling analysis, if required
- Chemical Sampling and Analysis
- Flammable Gas Analysis (FGA) for transportation requirements
- Source control
- Acceptable Knowledge (AK)
- Data validation and reconciliation
- Measuring and Test Equipment (M&TE)
- Work standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals

- Procurements
- Records
- TRU Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry
- Transportation

These services will be performed with CCP and/or Host site equipment with appropriate DOE/CBFO-certified procedures. The Host site may augment CCP characterization efforts as requested by CCP. Augmented services provided by the Host site shall comply with applicable CCP procedures. The Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling analysis deemed necessary by the WIPP Co-Permittees. The Host site/generator services covered by this document include programs for Radiological Controls, Occupational Safety and Health, Industrial Hygiene, Nuclear Safety/Authorization Basis (AB), Emergency Management, and Environment/Hazardous Waste Management.

2.0 REQUIREMENTS

This document implements the applicable requirements of the following:

DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria For The Waste Isolation Pilot Plant*

DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan*

DOE/WIPP-02-3283, *RH Packaging Program Guidance*

DOE/WIPP-02-3284, *RH Packaging Operations Manual*

CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*

CCP-PO-002, *CCP Transuranic Waste Certification Plan*

CCP-PO-005, *CCP Conduct of Operations*

CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*

DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*

DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Quality Assurance Program Document (QAPD)*

WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*

PDD-851, *10 CFR 851 Work Safety and Health Program*

PLN-260, *ICP Radiation Protection Program*

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization and certification activities in accordance with governing requirements described herein. CCP services include compilation, reporting and confirmation of AK, NDE, RC, radiochemistry sampling, VE, FGA for waste certification, WWIS/WDS data entry, and transportation activities.

The Host site Contractors responsibilities are limited to CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host site/generator documents provided to CCP.

3.1 Initial Setup

3.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host Site Management Representative (SMR)/Designee, who will coordinate facility, QA, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site safety basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures or processes.
- [D] Mobilization of project management and staff.

3.2 Operations

3.2.1 CCP is responsible for the following activities to support operations:

- [A] Performing system start-up and calibration of characterization equipment at the Host site.
- [B] Performing safety walk-downs, management, and laboratory assessments prior to operation.
- [C] Responding to and resolving assessment and surveillance findings for CCP startup activities.

- [D] Ensuring CCP and Host site personnel are trained and qualified in accordance with the requirements specified in Section 4.1.
- [E] Successful completion of DOE/CBFO Certification Audit.
- [F] Providing drum tracking support for the drums introduced into characterization activities.
- [G] CCP, through NWP-established programs, maintains the responsibility for reporting potential Price-Anderson Amendments Act (PAAA) issues resulting from the certification of TRU waste by CCP at INL. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification of TRU waste by CCP at INL. CCP shall allow the Host site to participate in the investigation of any waste certification event that results in an ORPS or PAAA report.
- [H] CCP shall support and participate in Host site investigations when CCP characterization activities result in a Host site initiated ORPS or PAAA report.
- [I] CCP shall maintain records in accordance with CCP-QP-008, *CCP Records Management*, and CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.
- [J] Successful completion of U.S Environmental Protection Agency (EPA) Continued Compliance Inspection
- [K] Successful completion of periodic CBFO and Host site quality assurance surveillances.

3.2.2 The Host site provides the following support for CCP activities:

- [A] Radiological controls as needed to support characterization activities, including:
 - Radiological postings.
 - Radiation protection surveys, both initial, routine and demobilization, on characterization equipment and provide approved survey reports to the CCP Site Project Manager (SPM) as required.
 - Personnel dosimetry.

- Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation, as required.
 - Radiological Work Permits (RWP) to support CCP activities, as required.
 - If required relative to bioassay samples, bioassay sample collection, evaluation, and reports will be provided to the CCP Vendor Project Manager (VPM).
 - Radiological source controls.
 - Radiological Technicians for monitoring.
 - CCP Personnel will adhere to Host site Radiological Program requirements.
- [B] Provides site-specific training as needed to ensure safe operations within the facility.
- [C] Provides ES&H support, as needed.
- [D] Provides Fire Protection and Emergency Management support, as needed.
- [E] Provides Host site Authorization basis oversight, including Unreviewed Safety Question (USQ) evaluations. The Host site is not responsible for oversight or USQ evaluations against authorization bases not owned by the Host site, such as the authorization basis for waste container transportation or handling and storage at the WIPP facility.
- [F] Provides environmental impact oversight and support, as needed.
- [G] Provides on-site sample and drum transportation.
- [H] Provides drum handling, inventory control, and storage location tracking.
- [I] Provides personnel to be trained and qualified under the CCP program as needed to support CCP activities (e.g., AK, VE, radiological characterization).

- [J] Performs document classification reviews, trade compliance for Export Control issues, and public release reviews of CCP generated Acceptable Knowledge report, source documents, and all waste stream specific applicable Remote-Handled programmatic documents.
- [K] The Host site maintains the responsibility for reporting PAAA issues resulting from issues with safe operation of CCP characterization activities (e.g., Technical Safety Requirements, Radiation Safety, Industrial Safety, IH, Maintenance, Lockout/Tagout, Conduct of Operations, etc.) at INL. This includes filing any ORPS reports resulting from issues with safe operation of CCP characterization activities at INL. The Host site shall allow CCP to participate in investigations resulting from ORPS or PAAA reports from issues with safe operation of CCP characterization activities at INL.
- [L] The Host site will be allowed to participate in CCP investigations when a waste certification event results in a CCP initiated ORPS or PAAA report.
- [M] Provides adequate space and file storage capacity for CCP personnel to maintain records.
- [N] Host site provides contact dose rate survey reports for RH determination.
- [O] Responsible for secondary generated waste.
- [P] Personal Protective Equipment (PPE), as necessary.
- [Q] Personnel facilities to accommodate the characterization and loading process.

3.3 CCP Project Manager

- 3.3.1 Functions as CCP's primary interface and point-of-contact (POC) between CCP and the SMR/Designee for waste characterization and certification activities.
- 3.3.2 Unless otherwise assigned herein, ensures documents listed in step 4.18.4 are provided to the Host site.
- 3.3.3 Ensures sufficient characterization equipment and personnel are available to perform the required characterization activities at the Host site.

- 3.3.4 Provides status on CCP characterization operations to the SMR/Designee, as requested.
- 3.3.5 Works in conjunction with SMR/Designee to establish and maintain reasonable and appropriate throughput of waste containers.
- 3.3.6 Ensures CCP management and CBFO are informed of safety, compliance, or production issues impacting CCP activities.
- 3.3.7 Reviews required software QA per CCP-QP-022, *CCP Software Quality Assurance Plan*.
- 3.3.8 Ensures the CCP Management Assessment program is implemented for CCP Operations and Host site waste management activities related to active CCP AK Summaries/Waste Stream Profiles.
- 3.3.9 Works with the SMR to schedule and ensure access to areas to perform visual observation of selected waste streams.
- 3.4 CCP Site Project Manager (SPM)
 - 3.4.1 Functions as CCP's primary WIPP WAC, Remote-Handled (RH) TRU WCPIP, and WAP subject matter expert (SME) and compliance authority.
 - 3.4.2 Ensures the AK Summary Report for waste characterization by the CCP is provided to the Host Site Management Representative (HSMR)/Designee.
 - 3.4.3 Ensures Waste Stream Profile Forms are reviewed and approved.
 - 3.4.4 Ensures that project level verification and validation of BDRs are completed.
 - 3.4.5 Ensures software used by CCP characterization at INL is controlled in accordance with CCP-QP-022.
 - 3.4.6 Coordinates presentation of AK briefings to CCP characterization personnel, generator site SMR, POCs/SMEs, or Cognizant Designees directly involved with the generation of each waste stream.
 - 3.4.7 Provides Acceptable Knowledge Expert (AKE) and SMR quarterly notifications that the Interface Waste Management Document List (IWMDL) are current.

- 3.4.8 SMR reviews the AKA to ensure Host site practices and procedures used to control the generation and/or management (e.g., waste repackaging, remediation, treatment) of the subject containers are accurate and complete as described by the AKA.
- 3.4.9 Performs or designates others to perform, visual observation of waste generating activities that change the physical and/or chemical properties of waste during or prior to the waste being packaged for CCP characterization for waste streams identified by the SMR.
- 3.5 Acceptable Knowledge Expert (AKE)
 - 3.5.1 Collects, compiles reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.5.2 Ensures CCP has obtained necessary container information prior to characterization.
- 3.6 Quality Assurance (QA) Engineer
 - 3.6.1 Functions as CCP's primary interface and POC for QA matters between CCP, Host site, DOE-ID, and DOE/CBFO.
 - 3.6.2 Validates the nonconformance reports (NCRs) generated by CCP personnel performing characterization activities at the Host site.
 - 3.6.3 Provides copies of NCRs for information to the Host site SMR/Designee, as requested.
 - 3.6.4 Ensures that nonconformances are dispositioned in a timely manner in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
 - 3.6.5 Ensures receipt inspection per CCP-QP-026, *CCP Inspection Control*, of procured items and services is performed.
 - 3.6.6 Provides the Host site SMR/Designee with a copy of the semi-annual trending summary reports per CCP-QP-014, *CCP Quality Assurance Trend Analysis and Reporting*.

- 3.7 Host Site Management Representative (SMR)/Designee
 - 3.7.1 Functions as the Host site primary interface and POC between the Host site and CCP.
 - 3.7.2 Ensures cognizant Host site and generator POCs/SMEs are identified and available as necessary to support the review of CCP documents defined in step 4.18.4.
 - 3.7.3 Coordinates review, provides comment, and approves comment resolutions on documents listed in step 4.18.4. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
 - 3.7.4 Ensures any USQs against the Host site authorization basis that may be needed for proposed modifications to CCP hardware, software, or procedures are prepared and approved by the appropriately qualified Host site personnel prior to CCP implementing the proposed modification.
 - 3.7.5 Ensures needed site infrastructure support, such as radiological, industrial safety, and IH is available for waste characterization.
 - 3.7.6 Ensures documentation of completed Host site-specific training is delivered to CCP Training.
 - 3.7.7 Coordinates review, provides comments, and approves comment resolutions on procedures listed in step 4.18.4 for the purpose of ensuring facility safety requirements are met.
 - 3.7.8 Provides local support to CCP including but not limited to VE, radiological characterization, and sampling personnel to support characterization operations as needed. Also provides personnel to support the CCP AKEs in the collection of required documents and procedures as needed.
 - 3.7.9 Ensures that periodic QA surveillances of CCP operations by the Host site are conducted and reported to CCP.
 - 3.7.10 Distributes the CCP documents listed in step 4.18.4 to Host site reviewers as required by the Host site administrative controls.
 - 3.7.11 Reviews and concurs in accordance with CCP-QP-010, on documents in step 4.18.4.

- 3.7.12 Provides facilities, construction services, utilities, phone services, office services, and supplies.
 - 3.7.13 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
 - 3.7.14 Verify IWMDL is complete for current Host site documents supporting repackaging and treatment activities.
 - 3.7.15 Review the accuracy and completeness of practices and procedures used by Host site to control the generation and/or management (e.g., waste repackaging, remediation, treatment) or the subject containers described by the AKA.
- 3.8 CCP Vendor Project Manager (VPM)
- 3.8.1 Monitors the List of Qualified Individuals (LOQI) daily (when characterization activities are being performed) to confirm that only qualified personnel perform waste characterization activities.
 - 3.8.2 Functions as CCP's primary interface and POC between CCP and the Host site SMR/Designee for characterization field operations.
 - 3.8.3 Provides pre-operation briefings when activities are being conducted.
 - 3.8.4 Ensures that in-process documents are transmitted to the CCP Site Project Office as soon as practicable.
 - 3.8.5 Ensures applicable Material Safety Data Sheets (MSDSs)/Safety Data Sheets (SDSs) are maintained and available to support operations.
 - 3.8.6 Provides oversight of field operations to ensure safe, efficient operations.
 - 3.8.7 Supervises day-to-day TRU waste characterization activities.
 - 3.8.8 Notifies the CCP Project Manager and the Nuclear Facility Manager of any abnormal events associated with safe operation of CCP characterization activities for reporting purposes.
 - 3.8.9 Ensures CCP has obtained necessary container information prior to characterization.

- 3.8.10 Notifies the Host site SMR/Designee of any potential ORPS or Noncompliance Tracking System-Reportable PAAA issues resulting from the certification of TRU waste by CCP at INL.
- 3.8.11 Obtains Host facility management daily release/approval prior to performing CCP operations.
- 3.9 Waste Certification Official (WCO)
 - 3.9.1 Obtains approved Waste Stream Profile Form (WSPF) for containers to be certified.
 - 3.9.2 Validates the CCP WWIS/WDS Data Spreadsheet.
 - 3.9.3 Certifies the data for the containers to be certified as identified on the CCP WWIS/WDS Data Spreadsheet.
 - 3.9.4 Submits the container data from the CCP WWIS/WDS Data Spreadsheet to the WWIS/WDS Characterization and Certification Modules as applicable.
- 3.10 Transportation Certification Official (TCO)
 - 3.10.1 Ensure CCP Transportation personnel are trained and qualified to perform WIPP-complaint contact-handled (CH) and RH TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current LOQL.
 - 3.10.2 Provides oversight of CCP Transportation personnel for payload and Overpack assembly and loading.
 - 3.10.3 Builds payloads from certified containers and Overpack provided by Waste Certification Officials (WCOs) in WWIS/WDS.
 - 3.10.4 Certifies payloads for transportation to and disposal at WIPP.
 - 3.10.5 Builds shipments from approved payloads in WWIS/WDS.

4.0 PROCEDURE

4.1 Training and Qualification

- 4.1.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.1.2 CCP and Host site personnel assigned to field operations must complete the Host site site-specific training. The SMR will ensure the Host site-specific training documentation is sent to CCP Training.
- 4.1.3 Both the CCP Training and Host site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.1.4 Administrative work, such as BDR reviews requiring no access to characterization activities or processes at the Host site, may be completed by personnel who have not completed the required Host site-specific training. Personnel who have not completed Host site-specific training will not be allowed unescorted access to the characterization activities.
- 4.1.5 A LOQI will be monitored daily by the CCP VPM to confirm CCP personnel and Host site personnel assigned to CCP are qualified.
- 4.1.6 Immediate notification, in writing, will be provided by CCP or the Host site if any required qualification is revoked, suspended, or expires.
- 4.1.7 The SMR will ensure that the site-specific training documentation is sent to CCP Training and notification is made to the SPM. It is recognized that additional or incidental non-core training may periodically be required by Host site to address special circumstances, response to events, or to communicate other information to affected workers that may not appear on the formal Training Matrix.
- 4.1.8 CCP will notify Host site Training and the Host site SMR of any personnel changes in CCP staff at INL, including transportation, and will identify the CCP positions to which the new individual will be trained.

- 4.1.9 The addition of CCP or Host site personnel to the CCP LOQI will follow the following sub-steps:
- [A] Host site Training will schedule site-specific training for identified CCP personnel.
 - [B] CCP Training will verify completion of CCP Qualifications and submit the completed CCP Qualification Card to Host site Training.
 - [C] The Host site Qualified Watch List (QWL) is provided to CCP Training as verification that applicable site-specific training has been completed for all personnel qualified under the CCP qualification program.
 - [D] Host site Training verifies completion of site-specific training, verifies completion of the CCP Qualification Card, and places the individual on the Host site QWL.
 - [E] CCP Training will issue the LOQI which reflects completion of both site-specific and CCP position qualifications.
 - [F] Host site Training will provide an updated site-specific QWL to CCP Training, as needed, for use in maintaining the LOQI.
 - [G] CCP Training will provide an updated LOQI, as needed, to support work activities and personnel qualification needs.

4.2 Container Management

- 4.2.1 The Host site is responsible for drum movement and storage.
- 4.2.2 The Host site will provide the dose rate and surface contamination information necessary to certify the container or canister for disposal.
- 4.2.3 CCP is responsible for container management throughout the CCP characterization process.
- 4.2.4 The Host site is responsible for providing documented information to the CCP SPM on any modification to a drum or canister after closure and/or AK has been approved.
- 4.2.5 The CCP SPM will review the documented information of modified drums and will notify the SMR when the drums are approved for entrance into the CCP characterization process.

4.3 Deficiencies and Nonconformances

4.3.1 CCP Identified Deficiencies and Nonconformances

NOTE

CCP QA will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If CCP personnel identify a nonconformance condition associated with a waste container during the CCP characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
 - [B] If the deficiency or nonconformance is an issue that will be resolved by CCP, CCP VPM will provide notification (e.g., verbal or e-mail as required by the Host site) to the Host site SMR/Designee. The Host site SMR/Designee may request any supporting documentation needed by the Host site. CCP will ensure appropriate closure of the deficiency. A copy of any CCP NCR related to DOE TRU waste at the INL will be provided to the Host site SMR/Designee upon request.
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NOTE

In some cases, INL may perform the work required to resolve deficiencies identified in CCP NCR and will initiate internal documentation as required by the INL program. However, the CCP NCR will remain open until resolution of the NCR condition has been confirmed by CCP under its certified program. At that point, CCP will close the NCR.

- [C] If the deficiency or nonconformance cannot be resolved by the CCP (e.g., does not meet TRU Waste Acceptance Criteria), then the specific drum will be returned with all required documentation to the Host site for disposition.
- [D] CCP personnel will immediately notify the CCP VPM of any abnormal event associated with the safe operation of CCP characterization activities. The CCP VPM will notify the CCP Project Manager and the Nuclear Facility Manager of the abnormal event.
- [E] The VPM will notify the SMR/Designee of potential CCP ORPS and PAAA reports resulting from the certification of waste by CCP at INL.

4.3.2 Host site Identified Deficiencies and Nonconformances

- [A] Deficiencies or Nonconformances identified by the Host site during this project which affect waste characterization or certification activities shall be promptly identified to the CCP VPM, who will initiate an NCR in accordance with the existing CCP deficiency reporting process in accordance with CCP-QP-005.

4.4 Visual Examination (VE)

- 4.4.1 CCP will conduct VE at the time of waste packaging or as required by the governing documents in accordance with CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*, or CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination* using a facility provided by the Host site.

- 4.4.2 Host site will be responsible for all maintenance and repairs to the facility used for VE and/or repackaging operations.

4.5 Nondestructive Examination (NDE)

- 4.5.1 CCP will perform NDE using a radiography unit supplied by the Host site in accordance with CCP-TP-508, *CCP RH Standard Real-Time Radiography Inspection Procedure* or CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*. Containers rejected by NDE will either be processed by VE and repackaged or will be dispositioned by the Host site consistent with the requirements of Section 4.3.

- 4.5.2 The Host site will ensure that waste containers provided to CCP for the radiography process are staged such that the waste will not be frozen (i.e., no chance of liquids in the waste container being frozen).

4.6 Radiological Characterization

- 4.6.1 The Host site will provide technical support and facilities as needed for radiological characterization efforts based on the use of AK for stored RH TRU waste or for sampling and analysis if AK is insufficient.
- 4.6.2 CCP will provide qualified personnel, including Host site personnel, to perform radiological characterization activities.
- 4.6.3 The Host site will provide support for the CCP for performing calibration of Radiological Characterization instrumentation. This support includes delivery of surrogate drums and source control as needed.

- 4.6.4 If the preliminary radiological results indicate an individual drum, or suite of RH TRU drums staged for characterization in the INTEC facility, contain a fissile gram amount greater than 315 grams, the appropriate Host site Shift Supervisor or Facility Manager shall be immediately notified. The Host site Operations will remove the container(s) and provide storage in a safe configuration. The CCP will provide a finalized Radiological Characterization Analysis Report to the Host site SMR/Designee within seven days.
- 4.7 Flammable Gas Analysis (FGA)
 - 4.7.1 CCP will perform sampling and analysis using a Gas Chromatograph/Mass Spectrometer (GC/MS) with Thermal Conductivity Detector in accordance with DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*.
 - 4.7.2 Host site will be responsible for replacing the filter vent, as needed.
- 4.8 Source Control
 - 4.8.1 No Special Nuclear Material (SNM) sources are anticipated to be required to support radiological characterization.
 - 4.8.2 The Host site will be responsible for management of all Radiological Characterization Non-SNM reference sources, following their current policies and procedures. The Host site will provide CCP the number of sources, location, isotopic distribution with activity levels, and names of the custodian and authorized users, as required.
 - 4.8.3 The Host site will be responsible for providing radiological control support associated with the CCP non-SNM reference sources, following their current policies and procedures.
 - 4.8.4 The Host site, as custodian of non-SNM sources, will provide to CCP the necessary sources for calibration as requested. Host site personnel will load the sources into the matrix drums as requested by CCP. CCP personnel will be trained as users of the sources to the Host site procedures.
- 4.9 Acceptable Knowledge (AK)
 - 4.9.1 CCP records personnel or generator site will maintain the auditable AK record necessary to support the AK Summary Report in accordance with the Waste Analysis Plan and DOE/CBFO-QAPD.

4.9.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005 and/or the WCPIP.

[A] The SMR assists CCP AK personnel with AK collection, as requested.

4.9.3 CCP AK personnel and Host site/generator personnel develop an IWMDL that includes current facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning (D&D) operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

[A] The AKE develops the new or revised IWMDL in accordance with CCP-TP-005 using the existing body of AK documentation.

[B] The SMR ensures Cognizant Host site/generator personnel (CP) are assigned to review the new or revised IWMDL for accuracy and completeness and provide written comments as appropriate.

[C] The AKE and CP resolve comments and questions.

[D] CCP posts the new revised IWMDL on the CCP secure file transfer protocol (sftp) site.

NOTE

This note applies to step 4.9.4. The activities of step 4.9.4 may be initiated as necessary by the AKE for existing waste streams, new waste streams, or during AK revisions/updates.

4.9.4 AKAs are performed in accordance with CCP-TP-005.

- [A] SPM provides SMR with the AKA results.
- [B] SMR distributes results of the AKA to designated CPs for review and comment.
- [C] AKE resolves comments with SMR and CPs.
- [D] SMR reviews the AKA to ensure Host site practices and procedures used to control the generation and/or management (e.g., waste repackaging, remediation, treatment) of the subject containers are accurate and complete as described by the AKA.

4.9.5 CCP submits new or revised AK Summary Reports and source documents for classification, trade compliance for Export Control issues, and public release review.

4.9.6 CCP submits new or revised AK Summary Reports to the SMR/Designee for review and concurrence.

- [A] The SMR ensures CP review and comment on the AK Summary Report in accordance with CCP-QP-010.

4.9.7 Representative CPs attend a briefing on new or revised AK Summary Batches.

4.9.8 CP notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to the IWMDL.

4.9.9 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the AK Summary Report is needed.

4.9.10 The Host site will not provide any waste container to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repackage the container.

[A] The work document(s) provided to the AKE will contain the following information at a minimum:

- Identification (including revision) of the work document(s) used to generate the container
- Type of activity (e.g., packaging/repackaging only, remediation, treatment)
- Amount (estimated) and type of liquids
- Type and quantity (estimated) of absorbents used
- Type and quantity (estimated) of neutralization agents used
- Any unexpected conditions or reactions encountered
- General description of waste items
- Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
- Filter data including model and quantity used
- Parent container identification

4.9.11 The AKE will ensure they have obtained and reviewed the correct version of IWMDL documentation used to generate/manage a container before adding it to the AK Tracking Spread Sheet (AKTSS).

4.9.12 At a minimum of once per calendar quarter, Host site/generator management will review the current IWMDL and provide written assurance to the CCP SPM that the list is up to date **OR** provide necessary documentation to revise the list for waste streams expected to generate additional containers of TRU waste or if containers in the waste stream will be repackaged or remediated. Revision to the IWMDL can serve to meet the Quarterly SMR notification requirement.

4.10 Data Validation and Reconciliation

4.10.1 CCP, using CCP-trained Host site personnel where applicable, will provide data generation level validated data packages for all characterization activities. CCP will provide data generation level validated data packages for Radiography, Radiochemistry sampling & analysis, Radiological Characterization, Flammable Gas Analysis, and VE in accordance with the approved CCP procedures governing these processes.

4.10.2 Wherever CCP has obtained the services of another CBFO-certified TRU Waste Program, that program will provide data generation level BDRs to CCP in accordance with their own programmatic documents.

4.10.3 CCP will provide project level validated data packages for Radiography, Radiochemistry sampling & analysis, Radiological Characterization, and VE.

4.10.4 The CCP SPM and AKE will perform data reconciliation with applicable data quality objectives (DQOs) in accordance with CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data* and/or the Characterization Reconciliation Report.

4.11 Measuring and Test Equipment (M&TE)

4.11.1 For CCP M&TE that requires calibration, the CCP M&TE Custodian will provide recall notification to the Host site designee.

4.11.2 For Host site M&TE furnished for use in the CCP program, the Host site SMR/Designee will provide notification to the CCP M&TE Custodian when M&TE are added, deleted, or found-out-of-tolerance/defective.

4.11.3 The Host site will make available National Institute of Standards and Technology (NIST)-traceable calibration services for M&TE to the CCP. The Host site will maintain records on M&TE calibration in accordance with their Records Inventory and Disposition Schedule (RIDS). The Host site M&TE contact will make the Certificates of Calibration for these M&TE items available to the CCP VPM and/or CCP M&TE Custodian prior to issuing M&TE to CCP for use, or for M&TE calibrated through a work package, within 14 days of completion of calibration.

4.11.4 The Host site will make available national standard-traceable calibration services for gamma and neutron dose measurement instrumentation. The Host site will maintain records on calibration in accordance with their RIDS. Copies of the Certificates of Calibration will be made available to the CCP VPM and/or CCP M&TE Custodian prior to issuing the instrumentation to CCP for use.

4.11.5 The Host site SMR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.

4.12 Work Standards

4.12.1 CCP operations personnel will work under the Host site Lockout/Tagout procedure.

4.12.2 CCP and Host site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste characterization and certification activities. Host site procedures and work packages will be used for non-waste characterization activities (e.g., equipment repairs).

4.12.3 CCP operations personnel will operate in accordance with CCP-PO-005, *CCP Conduct of Operations*.

4.12.4 CCP operations personnel will comply with Host site procedures as they apply to established characterization areas.

4.12.5 CCP personnel will work under the Host site safety basis and work control standards, (i.e., General Employee Radiological Training [GERT]). Maintenance work control activities for CCP supplied equipment will be controlled using CCP-TP-140, *CCP Equipment Maintenance*. Maintenance work control activities on Host site-supplied equipment will be controlled using Host site work authorization procedures.

4.12.6 As outlined in CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, and CCP-PO-005, it is the responsibility of the CCP VPM to maintain equipment configuration and authorize equipment changes to ensure characterization systems are operated and maintained in accordance with the Host site safety basis. The CCP VPM will not authorize a change to any characterization system until steps 4.12.6 [A] and [B] have occurred:

[A] The CCP Cognizant Engineer has reviewed and approved the proposed change in writing to the CCP VPM (this may be

accomplished via e-mail). In addition, any proposed change to any vendor-supplied characterization system must be reviewed and approved by an appropriate vendor engineer or representative. The vendor engineer or authorized representative must provide written approval to the CCP VPM (this may be accomplished via e-mail) for the proposed change.

- [B] The Host site SMR/Designee must concur with the proposed change in writing (this may be accomplished by e-mail) and provide a copy of the approved USQ against the Host site authorization basis, if it is required.
- [C] The Host site will manage the configuration of the radiography and assay units in accordance with the appropriate Host site procedures. Once these systems have been turned over to CCP for operation, no change to the configuration will be approved by the Host site without CCP's concurrence in writing (this may be accomplished by e-mail) from the CCP VPM.

- 4.12.7 CCP personnel will participate in the Host site bioassay program. CCP personnel involved in VE of waste will provide routine samples as required by the Host site. All other CCP personnel will provide samples as requested under the routine/random program established by the Host site. All CCP personnel will submit the bioassay samples required to establish a baseline for activities at the Host site.
- 4.12.8 The Host site will calculate bioassay sample results once received from Lab and provide to CCP personnel within 60 days.
- 4.12.9 The CCP Project Manager or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.
- 4.12.10 Host site radiological controls personnel will perform routine surveys for contamination and radiation as specified in Host site policies or procedures. The CCP Project Manager or CCP VPM and appropriate Host site management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied buildings or any of the CCP-operated characterization equipment contained in these buildings. Access to and copies of routine survey results will be made available to CCP upon request.

- 4.12.11 The Host site will provide immediate notification to the CCP Project Manager or CCP VPM of continuous or fixed air sample filter results that exceed established limits for areas routinely occupied by CCP personnel. Access to and copies of air sample results will be made available to CCP upon request.
- 4.12.12 The Host site will provide the necessary dosimetry for CCP personnel. Dosimetry reports will be provided to the CCP Project Manager or CCP VPM, upon request.
- 4.12.13 CCP will provide historical information on the operation of any CCP equipment deployed at Host site for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.
- 4.12.14 Work activities will be authorized by the Host site Nuclear Facility Manager/Designee based on the Host site QWL.
- 4.13 Waste Certification and WIPP Waste Information System (WWIS/WDS) Data Entry
 - 4.13.1 CCP will prepare WSPFs for the subject Host site waste in accordance with CCP-TP-002.
 - 4.13.2 CCP will transmit characterization and certification data in accordance with WWIS/WDS and CCP-TP-530, *CCP RH TRU Waste Certification and WWIS/WDS Data Entry*.
 - 4.13.3 CCP shall submit copies of WSPFs to the Host site for information before submittal to CBFO. The Host site will provide written concurrence on the basis of continued compliance with procedures and programs and CBFO certification of the CCP characterization program.
 - 4.13.4 The CCP WCO will document and certify that all TRU waste payload containers meet the requirements of the WAC, and submit the data to the WWIS/WDS for approval.
 - 4.13.5 The CCP WCO will provide listings of drums requiring retrieval from storage for the purposes of loading into RH TRU 72-B Canisters.
 - 4.13.6 CCP will begin their loading and shipping process using payload containers approved in WWIS/WDS.

4.14 Transportation

- 4.14.1 CCP is responsible for meeting all requirements for loading and shipping TRU waste certified by CCP as approved in WWIS/WDS.
- 4.14.2 The Host site will load drums into canisters according to CCP WCO listings, using approved procedures, and will provide the CCP WCO with the necessary data to complete the process.
- 4.14.3 The CCP WCO will work with the Host site as necessary to complete the appropriate transportation activities.
- 4.14.4 The CCP Transportation Certification Official (TCO) will work with the Host site as necessary to load the canisters into the RH TRU 72-B Casks.
- 4.14.5 The CCP TCO will coordinate the completion of the preparations of the RH TRU 72-B Cask for shipment in accordance with DOE/WIPP-02-3283, *RH Packaging Program Guidance* and DOE/WIPP-02-3284, *RH Packaging Operations Manual*.
- 4.14.6 CCP Transportation will coordinate with the Host site to complete the following activities:
 - [A] The Host site will procure all RH TRU 72-B Waste Containers and System Components from NWP.
 - [B] The Host site will load RH TRU 72-B Waste Containers with drums as delineated by CCP's TCO.
 - [C] The Host site will mechanically latch the RH TRU 72-B Waste Container Lid into the closed and fastened position using tooling and procedures as delineated by CCP.
 - [D] The Host site will position loaded RH TRU 72-B Waste Containers in RH TRU 72-B Casks.
 - [E] The Host site will place the RH TRU 72-B Cask Inner Vessel Container Lid into position and torque lid bolts in accordance with CCP's procedure.
 - [F] The Host site will perform Leak Rate Testing of the torqued Inner Vessel Lid in accordance with CCP's Leak Rate Test procedure. In the event of Leak Rate Test failure, the Host site will change out O-Rings and retest the Inner Vessel Lid for Leak Rate Acceptance.

- [G] The Host site will place the Cask Lid into position and torque lid bolts in accordance with CCP's procedure.
- [H] The Host site will perform Leak Rate Testing of the torqued Cask Lid in accordance with CCP's Leak Rate Test procedure. In the event of Leak Rate Test Failure, the Host site will change out O-Rings and retest the Cask Lid for Leak Rate Acceptance.
- [I] The Host site will load the assembled RH TRU 72-B Cask on the RH TRU 72-B Trailer and install the Impact Limiters in accordance with CCP's Cask Loading procedure.

4.15 Quality Assurance (QA)

- 4.15.1 All work performed in the completion of this waste characterization and certification scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.
- 4.15.2 CCP will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.
- 4.15.3 The Host site will conduct audits/surveillances to assess compliance with applicable procedures.

4.16 Procurement

- 4.16.1 All items and services to be purchased under CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, will be graded by CCP in accordance with CCP-QP-001, *CCP Graded Approach*. The grading will determine whether the items and services are quality-affecting (Quality Level 1 or Quality Level 2) or non-quality affecting (Quality Level 0) for WIPP characterization, certification, and transportation.
 - [A] CCP will procure all quality-affecting items and services required for characterization in accordance with CCP-QP-015, *CCP Procurement*. These items and services are the sole responsibility of CCP with regard to their quality integrity.
 - [B] Host site will procure items and services determined by the CCP grading process to be non-quality affecting for WIPP characterization, certification, and transportation. The Host site will be responsible for verification and compliance for these items and services.

- [C] Items and services that are related to safe operation of the facility, and which do not affect WIPP characterization, certification, and transportation, are not required to be graded by CCP.
- [D] Receipt inspection of quality-affecting items will be performed by personnel trained and qualified to CCP-QP-002.
- [E] CCP will maintain Source/Receipt Inspection Verification Sheets (SRIVS) and associated objective evidence for each shipment in accordance with CCP-QP-026.
- [F] CCP will provide Host site advance notice (two weeks preferred) regarding anticipated receiving inspections that will be performed by Host site personnel trained and qualified by CCP.
- [G] Advance notice (two weeks preferred) will be provided to the Host site for expected delivery dates for NWP supplied equipment. Sufficient data (e.g., vendor data, procurement documents) will be provided to the Host site to allow development of Host site receipt inspection plans.

4.17 Project Control

- 4.17.1 CCP and Host site will provide weekly status for their respective scheduled activities and production matrix/curves.
- 4.17.2 CCP will provide Host site with an up-to-date earned value plan, and estimates of completion at the end of each month, or as requested.
- 4.17.3 CCP will maintain and provide Host site with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.
- 4.17.4 CCP will establish and maintain separation of costs and invoices from other CCP-performed work at the INL.
- 4.17.5 CCP will provide Host site with invoices reflecting labor hours, subcontracted service, and material costs grouped to the specific activity (i.e., AK, Deployment, Startup, and Operations) performed.
- 4.17.6 CCP will provide timely cost estimates to the Host site SMR/Designee for any new CCP activities planned.

4.17.7 CCP will provide the Host site SMR/Designee with schedule and actual cost data for scheduled activity on a monthly basis.

4.18 Procedures

4.18.1 As defined in CCP-QP-010, editorial or minor changes may be made to all CCP documents except CCP-PO-001, CCP-PO-002, *CCP Transuranic Waste Certification Plan*, CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*, and CCP-QP-001, without the same level of review and approval as the original document. CCP will process any required changes in accordance with CCP-QP-010.

4.18.2 New Technical Operating Procedures (procedures that operate equipment) developed by CCP scheduled to be used at the Host site, shall be evaluated by the Host site SMR/Designee to determine if the procedure shall be added to the Host site review lists defined below.

4.18.3 RH Programmatic documents developed will be submitted to the host site for classification, trade compliance for Export Control issues, and public release review.

4.18.4 The following documents and revisions to these documents will be provided to the SMR for review by SMEs/CP; if the procedure is an operational procedure that CCP is not currently operating to, the SMR may waive his review until CCP operations commence on site. When CCP operations return to the site the SMR will be provided all procedures listed below for review.

- CCP AK Reports
- CCP Interface Waste Management Documents List
- CCP AK Assessments
- CCP WSPF's
- CCP Radiological Characterization Technical Reports
- CCP Compliance and Confirmation Test Plans
- CCP Chemical Compatibility Evaluation Memorandums
- Sampling and Analysis Plans

- CCP-HSP-014, *Health and Safety Program Implementation for CCP*
- CCP-PO-501, *CCP/INL RH TRU Waste Interface Document*
- CCP-TP-005, *CCP Acceptable Knowledge Documentation*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*
- CCP-TP-140, *CCP Equipment Maintenance*
- CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*
- CCP-TP-505, *CCP Removable Lid Canister/Neutron Shielded Canister Loading*
- CCP-TP-504, *CCP Dose-to-Curie Survey Procedure for Remote-Handled Transuranic Waste*
- CCP-TP-508, *CCP RH Standard Real-Time Radiography Inspection Procedure*
- CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*
- CCP-TP-512, *CCP Remote-Handled Waste Sampling*
- CCP-TP-554, *CCP Remote-Handled Grapple Pre-Operational Checks and Operation*

NOTE

This note applies to step 4.18.5. Examples of cognizant personnel may include, but is limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

4.18.5 Upon receipt of a document listed in step 4.18.4 the SMR/Designee will ensure the document is reviewed by cognizant personnel responsible for the waste management activities relevant to the scope of the document.

4.18.6 As warranted, the SMR/Designee will provide written comments to CCP using Document Review Record (DRR) in accordance with CCP-QP-010 or Host site equivalent.

4.18.7 CCP, at its direction, may request objective evidence to support the competency of Host site/generator reviewers.

4.18.8 The CCP SPM will confirm that the SMR/Designee written comments are resolved with the Host site SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.18.9 The following documents, and all revisions to these documents, will be provided to the Host site SMR/Designee as "Notify Only" for review:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
- CCP-QP-002, *CCP Training and Qualification Plan*

- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-TP-001, *CCP Project Level Data Validation and Verification*
- CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*
- CCP-TP-507, *CCP Shipping of Remote-Handled Transuranic Waste*

4.18.10 CCP will maintain control of procedures in accordance with CCP-QP-010.

4.18.11 The Host site SMR/Designee will review or designate the appropriate reviews of the CCP procedures listed in step 4.18.4, and forward written comments to CCP Document Control in accordance with CCP-QP-010 for resolution.

4.18.12 The CCP SPM will confirm that the Host site SMR/Designee written comments are resolved with the Host site SMR/Designee concurrence prior to proceeding with CCP operations.

4.19 Document Transmittals

4.19.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as QA records will be transmitted in accordance with CCP-QP-008.

4.19.2 Documents to be provided to the Host site by CCP include:

- [A] List of equipment requiring calibration
- [B] Copies of NCRs and Issue Notices, as applicable
- [C] Copies of AK Summary Reports
- [D] Copies of AK source documents and source document summaries, as requested

- [E] Copies of semi-annual trending summary reports
- [F] Copies of QA surveillance reports
- [G] Copies of WSPFs
- [H] Copies of VE, NDE, Radiochemistry sampling & analysis, Radiological Characterization data, FGA, as requested
- [I] Copies of SRIVS and associated objective evidence for each shipment
- [J] Information on chemical usage and copies of applicable MSDSs/SDSs as requested for inventory or reporting reasons
- [K] Copies of training requirements and associated training records for Host site personnel supporting CCP
- [L] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/EPA or other regulatory audit or compliance/enforcement actions that may impact its ability to characterize and transport TRU waste
- [M] Copy of final data package to WIPP via WWIS/WDS, as requested
- [N] NMED and United States EPA approval of the CBFO Certification Audit Report
- [O] Documents called out in step 4.18.4.

4.19.3 Documents to be provided to CCP by Host site, upon request, include:

- [A] Documentation of required training
- [B] Documentation of training completion for CCP and Host site personnel for training received from the Host site
- [C] Copies of AK source documentation requested by CCP
- [D] Radiological dose rate and surface contamination results on waste drums as needed to support WWIS/WDS data entry
- [E] Radiological information as described per paragraph 3.2.2[A] of this document

- [F] Copies of NCRs, deficiency reports, or other nonconformance documentation per Section 4.3
- [G] Copies of the results of Host site assessments pertaining to CCP
- [H] Copies of calibration certifications
- [I] Copies of QA surveillance reports

4.20 Authorization Safety Basis and Configuration Management

- 4.20.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved Host-site documented safety analysis.
- 4.20.2 CCP has responsibility to ensure compliance with procedures that protect the personnel, public, and environment.
- 4.20.3 Accordingly, for CCP provided equipment, CCP will provide the documentation necessary for Host site to perform the evaluation against the safety analysis. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary by Host site.
- 4.20.4 For Host site-provided equipment, CCP will review operational and authorization basis documentation including USQs to ensure the safety of CCP personnel while operating the equipment.
- 4.20.5 All changes to equipment operated by CCP will be controlled by the Host site work control program to ensure appropriate authorization-basis evaluations are conducted, and associated controls are established.
- 4.20.6 The Host site will inform CCP of changes to authorization basis documentation that affect CCP operations prior to implementation.
- 4.20.7 CCP will provide to the Host site new AK information acquired that affects the material-at-risk inventory.

4.21 Radiochemistry Sampling and Analysis

- 4.21.1 Host site will provide technical support and facilities as needed to support sample collection, transfer, and analysis for radiochemistry or Resource Conservation and Recovery Act (RCRA) constituents if

AK is insufficient or direction is received to sample.

4.21.2 CCP will provide qualified personnel, including Host site personnel, to perform sample collection activities.

4.21.3 The Host site will use a WIPP-approved laboratory to perform analysis of radiochemistry and homogenous solid samples.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP documents referenced in this plan are maintained in accordance with CCP-QP-008.
- 5.3 All QA records generated by CCP documents referenced in this plan shall be maintained by CCP.
- 5.4 All QA records generated by CCP will be maintained and dispositioned in accordance with CCP-QP-028.
- 5.5 Host site will maintain the following records in accordance with Host site requirements. The list includes, but is not limited to, the following:
 - 5.5.1 MSDS/SDS
 - 5.5.2 Calibration Certifications
 - 5.5.3 Project Control schedules and cost data reports

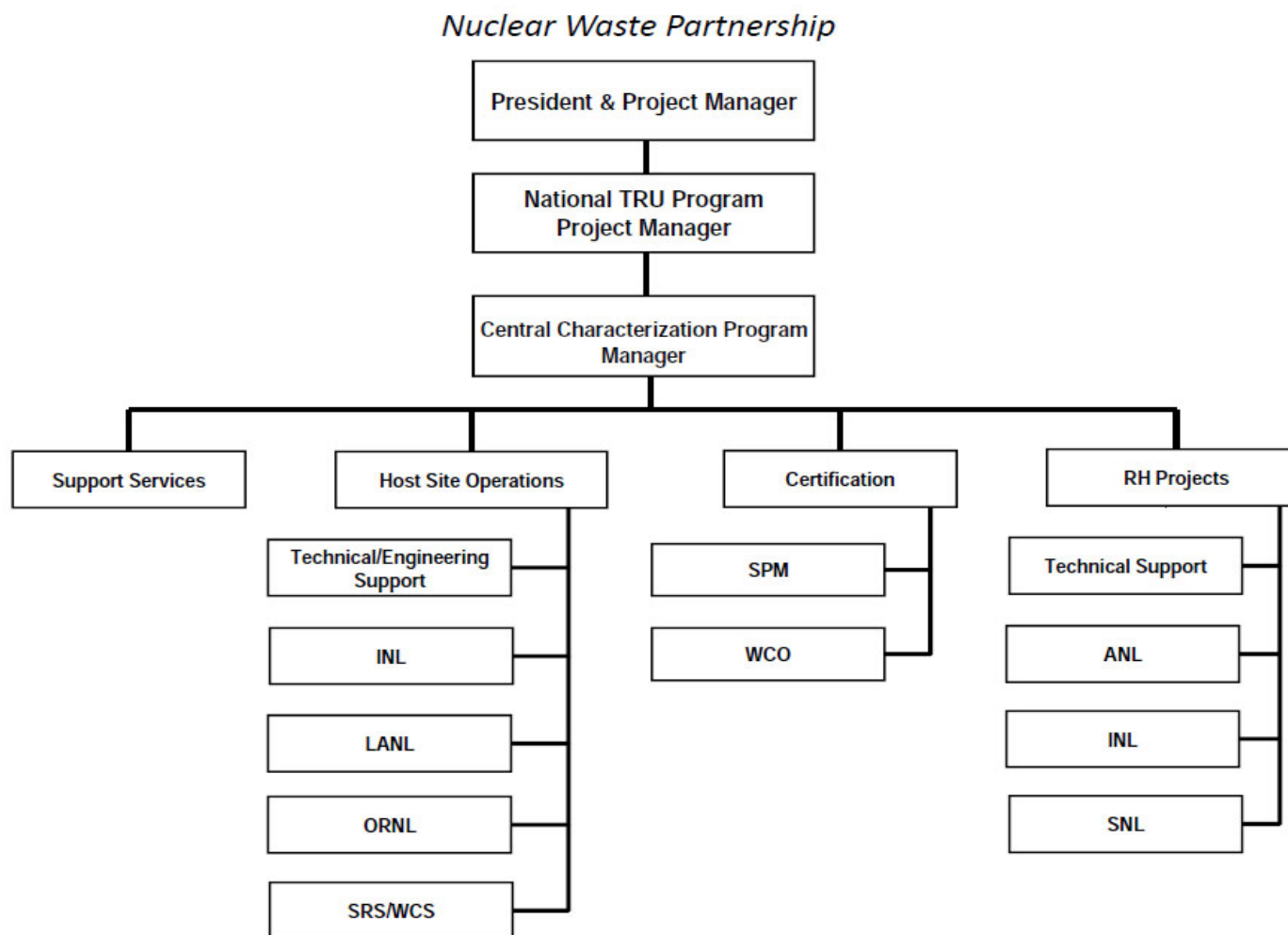
6.0 OVERSIGHT

NOTE

Through the Affiliate Agreement between the Host site and NWP, and the associated SOW, the Host site has delegated the authority to characterize, certify, and ship TRU waste to the WIPP. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the WCPPI, WAC, and WAP. However, the Host site may conduct, at their discretion, periodic surveillances of CCP operations.
- 6.2 Following successful completion of the certification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with the Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP SPM. CCP QA and the SPM will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any finding or other deficiencies against the CCP SOW.
 - 6.3.2 If required, prepare and process Issue Notices in accordance with WP 15-GM1002, *Integrated Issues Management*, for deficiencies identified during the review.
 - 6.3.3 Provide Host site QA with CCP actions to correct the identified deficiencies, as documented in the Issue Notice.
 - 6.3.4 CCP QA will maintain an information file of the Host site surveillance reports conducted on the CCP SOW.

Figure 1. Nuclear Waste Partnership – RH



CCP-PO-027

Revision 9

CCP/TRU Waste Processing Center/Oak Ridge National Laboratory Interface Document

EFFECTIVE DATE: 06/03/2021

Daniel Wade

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	10/02/2007	Initial issue.
1	02/17/2010	Revised due to the deployment of the Mobile IQ3 Nondestructive Assay (NDA) system to the transuranic (TRU) Waste Processing Center (TWPC).
2	04/22/2010	Revised to remove the requirement to apply Central Characterization Project (CCP) hold tags to containers which are returned to the host facility as permanent rejects.
3	12/29/2010	Minor revision to update references to the <i>Waste Isolation Pilot Plant Hazardous Waste Facility Permit</i> .
4	10/01/2012	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes.
5	10/02/2013	Revised to incorporate Class 2 Permit Modification changes, dated March 13, 2013 and to include the freeze file as of 11/20/2012. Changes in the freeze file include: <ol style="list-style-type: none">1. Measuring and testing equipment (M&TE) changes proposed by S. Burns to make CCP-PO-027 similar to other interface documents that were affected by CAR-LANL-003-12.2. An "Any documentation required for Central Characterization Program (CCP) to perform its scope" added.3. Training information in Section 4.1.3 revised.4. Removed references to drum venting system (DVS) as equipment is no longer on site.5. Section 4.13.6 [A] revised to generalize CCP Project Manager (PM's) approval of CCP-CM-001, <i>CCP Equipment Change Authorization and Documentation</i> information.6. "CCP or CCP Vendor owned equipment" added where needed.
6	02/02/2016	Revised format and content to better align with a standardized Central Characterization Program (CCP) interface document format and to address enhancements pertaining to the Acceptable Knowledge (AK) process.

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
7	04/30/2019	Revised to update the acceptable knowledge (AK) section to better align with current CCP-TP-005, <i>CCP Acceptable Knowledge Documentation</i> practices. Added clarification on how containers are to be numbered by the Host site prior to providing them to Central Characterization Program (CCP) for characterization.
8	12/21/2020	Revised to address WIPP Form 19-988 to clarify requirements for receipt inspection and source control. Updated responsibilities for classification reviews. Added Section for Remote-Handled (RH) Waste Program.
9	06/03/2021	Minor Change – correcting WIPP forms to Issue Notices.

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1.0 PURPOSE

This document establishes the interfaces between the Nuclear Waste Partnership LLC (NWP) Central Characterization Program (CCP), and the Oak Ridge National Laboratory (ORNL) transuranic (TRU) Waste Processing Center (TWPC) for implementing services described in the applicable Statement of Work (SOW) and program documents. The CCP is operated by NWP at the direction of the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO).

This document is not intended to be used in lieu of a task-specific subcontract. Specifically, this document identifies CCP and Host site/generator responsibilities for implementing requirements and deliverables.

1.1 Background

The ORNL is a TRU waste generator site in the DOE complex. The TWPC is the centralized facility at ORNL for processing, characterizing, and shipping TRU waste off site for disposal. The DOE Oak Ridge Operations Office (ORO) manages all activities at the ORNL, including waste management, for the DOE.

The DOE/CBFO has deployed the CCP to the TWPC to characterize, certify, and ship legacy contact-handled (CH) and remote-handled (RH) TRU waste for disposal at the Waste Isolation Pilot Plant (WIPP). CBFO has audited and certified the CCP to perform these activities at the ORNL.

1.2 Scope

This document applies to the CCP, the Host site, and generators whose waste is characterized and certified by the CCP for the TWPC. Unless specifically stated otherwise, the TWPC is the Host site in this document. "Generator" may refer to the TWPC or it may refer to the facility that originally generated and/or treated and packaged the waste.

This document addresses CCP and Host site/generator responsibilities for the following areas:

- Facilities/equipment for TRU waste characterization and shipping
- Safety Programs
- Training and qualification
- Container management

- Deficiencies and nonconformances
- Nondestructive examination (NDE) including visual examination (VE) and real-time radiography (RTR)
- Nondestructive assay (NDA)
- Radiological Characterization (RC) including dose-to-curie (DTC) and sampling and analysis, if required
- Chemical Sampling and Analysis
- Flammable Gas Analysis (FGA) for transportation requirements
- Performance Demonstration Program (PDP)
- Source control
- Acceptable Knowledge (AK)
- Data validation and reconciliation
- Measuring and Test Equipment (M&TE)
- Work standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- TRU Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry
- Transportation
- Configuration Management

These services will be performed with CCP and/or Host site equipment with appropriate DOE/CBFO-certified procedures. The Host site may augment CCP characterization efforts as requested by CCP. Augmented services provided by the Host site shall comply with applicable CCP procedures.

CCP will also support the TWPC in their mission to dispose of Low Level and Mixed Low Level Waste (LLW/MLLW). This support will primarily be providing NDE and NDA data collected during CCP certified activities for containers that are subsequently determined by CCP to be LLW/MLLW waste containers.

The Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling analysis deemed necessary by the WIPP Co-Permittees.

The Host site/generator services covered by this document include programs for Radiological Controls, Occupational Safety and Health, Industrial Hygiene, Nuclear Safety/Authorization Basis (AB), Emergency Management, and Environment/Hazardous Waste Management.

2.0 REQUIREMENTS

All services provided by CCP will comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plan* (WIPP-WAC), the *Waste Isolation Pilot Plant Hazardous Waste Facility Permit* (WIPP-WAP), DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan* (WCPIP), DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD), and Certificates of Compliance (COCs) for Type B Packages issued by the Nuclear Regulatory Commission (NRC).

Requirements from these upper-tier documents flow down to the following program documents:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
- CM-A-IS-001, *Worker Safety and Health Program*
- CM-A-RP-005, *Radiation Protection Program*
- CM-P-RP-316, *Radiological Worker Training*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-02-3283, *RH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-17-3589, *Basis of Knowledge for Evaluating Oxidizing Chemicals in TRU Waste*

- WP 13-1, *Nuclear Waste Partnership LLC, Quality Assurance Program Description*

This work will be performed under a DOE/CBFO-certified QA program that meets the requirements defined in DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document (QAPD)*.

A more comprehensive list of documents included in the CCP System of Controls is provided in Section 4.24.

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization, certification, and transportation activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, NDE, VE, NDA, RC, FGA for transportation, data validation and verification, waste certification, WWIS/WDS data entry, and transportation activities.

The Host site Management and Operating (M&O) Contractors' responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with Host site/generator documents provided by CCP.

3.1 Operations

3.1.1 CCP performs the following operations activities:

- [A] Obtains Host site management daily release/approval prior to performing CCP operations.
- [B] Performs system start-up and calibration of characterization equipment at the Host site.
- [C] Operates CCP equipment in accordance with approved procedures including CCP-PO-005, *CCP Conduct of Operations*.
- [D] Performs safety walk-downs prior to operation.
- [E] Responds to and resolves assessment and surveillance findings for CCP activities.
- [F] Ensures CCP and Host site personnel are trained and qualified in accordance with the requirements specified in Section 4.3.
- [G] Demonstrates CCP operations during DOE/CBFO certification/recertification audits.
- [H] Performs Management Assessments and QA Surveillances on: 1) CCP Operations, and 2) Host site waste management activities referenced in active CCP AK Summaries/Waste Stream Profiles.

- [I] Performs inspection of containers provided by the Host site to ensure they are safe and ready for CCP characterization.

3.1.2 The Host site provides the following operations support for CCP activities:

- [A] Radiological controls as needed to support characterization activities, including:
 - Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide approved survey reports to the CCP Vendor Project Manager (VPM) as required.
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation, as required.
 - Radiological Work Permits (RWP) to support CCP activities, as required.
 - Bioassay sample collection, evaluation, and reporting, if applicable. The CCP TWPC Project Manager or CCP VPM will be notified of any positive bioassay results as soon as is reasonably possible.
 - Radiological source controls.
- [B] Provides adequate facilities for the safe performance of characterization and transportation activities.
- [C] Provides site-specific training, as needed, to ensure safe operations within the Host site.
- [D] Provides Industrial Safety and Health (IS&H) support, as needed.

- [E] Provides Fire Protection and Emergency Management support, as needed.
- [F] Provides AB oversight, including Unreviewed Safety Question (USQ) evaluations.
- [G] Provides environmental impact oversight and support, as needed.
- [H] Provides on-site container transportation.
- [I] Provides container handling, inventory control, and storage location tracking using the TWPC Container Tracking system.
- [J] Provides personnel to be trained and qualified under the CCP program as needed to support CCP activities such as VE, RC (DTC), etc., if applicable.
- [K] Provides calibrated M&TE for use in characterization or obtains calibration service for CCP provided M&TE.
- [L] Provides waste packaging materials and other equipment/materials purchased and inspected in accordance with the Qualified Supplier List (QSL) approved program.
- [M] Provides hazardous waste manifesting, bill of lading, and notifications for transportation.
- [N] Provides qualified personnel to support maintenance of CCP equipment.
- [O] Responds to and resolves CCP management assessment and CCP QA surveillance findings related to Host site waste management activities.

3.2 CCP ORNL Project Manager

- 3.2.1 Functions as CCP's primary interface and point-of-contact (POC) between CCP and the Site Management Representative (SMR)/Designee for waste characterization.
- 3.2.2 Unless otherwise assigned herein, ensures documents listed in step 4.24.3 are provided to the Host site.

- 3.2.3 Ensures sufficient characterization equipment and personnel are available to perform the required characterization activities at the Host site.
- 3.2.4 Provides status on CCP characterization operations to the SMR/Designee, as requested.
- 3.2.5 Works in conjunction with SMR/Designee to establish and maintain reasonable and appropriate throughput of waste containers.
- 3.2.6 Ensures CCP management and CBFO are informed of safety, compliance, or production issues impacting CCP ORNL activities.
- 3.2.7 Ensures the CCP Management Assessment program is implemented for CCP Operations and Host site waste management activities related to active CCP AK Summaries/Waste Stream Profiles.
- 3.2.8 Works with the SMR to schedule and ensure access to areas to perform visual observation of selected waste streams.
- 3.3 CCP Site Project Manager (SPM)
 - 3.3.1 Functions as CCP's primary interface and POC between CCP and the SMR/Designee for all waste certification activities and WIPP Waste Acceptance Criteria (WAC) and Waste Analysis Plan (WAP) subject matter expert (SME) and compliance authority.
 - 3.3.2 Ensures the AK Summary Report for TRU waste characterized by the CCP are prepared, approved, issued, and provided to the SMR/Designee.
 - 3.3.3 Ensures Waste Stream Profile Forms (WSPFs) are prepared, reviewed, and approved.
 - 3.3.4 Ensures that project level verification and validation of batch data reports (BDRs) are completed.
 - 3.3.5 Provides evidence to the SMR/Designee of PDP participation and successful completion.
 - 3.3.6 Ensures software used by CCP characterization at ORNL is controlled in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*.

- 3.3.7 Coordinate presentation of AK briefings to CCP characterization personnel, generator site SMR, POCs/SMEs or Cognizant Designees directly involved with the generation of each waste stream.
- 3.3.8 Provides AKE quarterly notifications that the Interface Waste Management Document Lists (IWMDLs) are current.
- 3.3.9 Transmit the Acceptable Knowledge Assessment (AKA) to SMR for distribution to site POCs/SME to verify accuracy and completeness and obtain concurrence signature from SMR.
- 3.3.10 Performs or delegates visual observation for conducting Waste Management Field Observations (WFMO) for waste streams actively being generated and/or repackaged by the Host site. This provides additional assurance that waste characterized by the CCP is generated as described by AK.
- 3.4 Acceptable Knowledge Expert (AKE)
 - 3.4.1 Collects, compiles reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.4.2 Ensures CCP has obtained necessary container information prior to characterization.
 - 3.4.3 Prepares and maintains the IWMDL for each waste stream, including the identification of the applicable procedure POCs/SMEs involved directly with the generation of each waste stream (identified by the SMR).
 - 3.4.4 Performs an AKA for each waste stream.
 - 3.4.5 Performs Chemical Compatibility Evaluations.
 - 3.4.6 Performs Basis of Knowledge Evaluations.
 - 3.4.7 Submit IWMDL and associated quarterly SMR notifications to the Site Project Manager (SPM) to submit to records.
 - 3.4.8 Document the AKA in an Assessment Memorandum to the SPM.
 - 3.4.9 Submits AK documents to classification review, as necessary.

- 3.5 CCP Quality Assurance (QA) Engineer
 - 3.5.1 Functions as NWP's primary interface and POC for QA matters between CCP, Host site, DOE/ORNL, and DOE/CBFO.
 - 3.5.2 Validates the Nonconformance Reports (NCRs) generated by CCP personnel performing characterization activities at the Host site.
 - 3.5.3 Provides copies of NCRs for information to the Host site SMR/Designee as requested.
 - 3.5.4 Ensures that NCRs are dispositioned in a timely manner in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
 - 3.5.5 Ensures performance of receipt inspection in accordance with CCP-QP-026, *CCP Inspection Control*, for items and services procured by CCP.
 - 3.5.6 Provides the SMR/Designee with a copy of the semi-annual trending summary reports in accordance with CCP-QP-014, *CCP Quality Assurance Trend Analysis and Reporting*.
- 3.6 Site Management Representative (SMR) (Host Facility Management Position)
 - 3.6.1 Functions as the Host site primary interface and POC between the Host site and CCP.
 - 3.6.2 Ensures cognizant Host site and generator POCs/SMEs are identified and available as necessary to support the review of CCP documents defined in step 4.24.3.
 - 3.6.3 Coordinates review, provides comments, and approves comment resolutions on documents listed in step 4.24.3. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.

- 3.6.4 Facilitates workflow between CCP and ORNL TRU waste generators as necessary to allow CCP to fulfill program requirements. This includes CCP access to generator processes and documentation as necessary.
- 3.6.5 Ensures unreviewed safety question determination (USQDs) needed for proposed modifications to CCP hardware, software, or procedures are prepared and approved by qualified Host site personnel prior to CCP implementing the proposed modification.
- 3.6.6 Ensures CCP is provided appropriate facilities, construction services, utilities, phone services, network services and office services necessary to perform their activities at the TWPC.
- 3.6.7 Notifies the CCP Project Manager (PM) and VPM of any safety basis changes to action levels that will impact CCP initiated notifications.
- 3.6.8 Ensures site support (e.g., Radiological, IS&H, waste handling, etc.) is available for waste characterization.
- 3.6.9 Ensures documentation of completed Host site-specific training is delivered to CCP Training.
- 3.6.10 Provides local personnel to support characterization operations such as VE. Also provides personnel to support the CCP AK Experts (AKE) in the collection of documents.
- 3.6.11 Works in conjunction with the CCP PM and VPM to maintain reasonable and appropriate throughput of waste containers.
- 3.6.12 Ensures that periodic QA surveillances of CCP operations by the Host site are conducted and reported to CCP.
- 3.6.13 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
- 3.6.14 Performs quarterly reviews of the IWMDL and notifies SPM that the list is complete and includes the most current revision of the relevant procedures.

3.6.15 Work with the CCP PM/Designee to schedule and ensure access requirements are met for visual observation of selected waste streams.

3.7 CCP Vendor Project Manager (VPM)

3.7.1 Obtains Host site management daily release/approval prior to performing CCP operations.

3.7.2 Ensures CCP and Host site personnel are trained and qualified to perform WIPP-compliant TRU waste characterization activities at the Host site prior to commencement of work activities.

3.7.3 Monitors the List of Qualified Individuals (LOQI) daily to confirm that only qualified personnel perform waste characterization activities.

3.7.4 Works in conjunction with CCP PM and Host site SMR/designee to maintain reasonable and appropriate throughput of waste containers.

3.7.5 Provides daily pre-operations briefing to CCP personnel. The daily pre-operations briefing may be combined with the Host site's pre-operations briefing as agreed between the CCP TWPC Project Manager and Host site operations management.

3.7.6 Ensures applicable manufacturers Material Safety Data Sheets and/or Safety Data Sheets (MSDSs/SDSs) for products brought to the facility by the CCP are provided, maintained, and available to support operations and meet the requirements of the TWPC chemicals management program.

3.7.7 Provides oversight of CCP field operations to ensure safe, compliant, and efficient operations.

3.7.8 Notifies the CCP ORNL Project Manager and the Host site Facility Manager/Operations Manager of any abnormal events associated with safe and compliant operation of CCP characterization activities for reporting purposes.

- 3.7.9 Ensures CCP notifications required to comply with the Host site safety basis are incorporated into appropriate CCP work documents and appropriate CCP personnel (including offsite personnel such as Independent Technical Reviewers [ITRs], NDA Expert Analyst [EA], and SPMs) are aware of their responsibility to make such notifications.
- 3.7.10 Obtains SMR review and concurrence prior to issuance/approval of CCP Operator Aids or Standing Orders that could affect changes to equipment operation or configuration.
- 3.8 Waste Certification Official (WCO)
 - 3.8.1 Obtains approved WSPF for containers to be certified.
 - 3.8.2 Will document and certify that all TRU waste payload containers meet the requirements of the WAC, TRUPACT-II Authorized Method for Payload Control (TRAMPAC), and submits the data to the WWIS/WDS for approval.
- 3.9 Transportation Certification Official (TCO)
 - 3.9.1 Ensures CCP Transportation personnel are trained and qualified to perform WIPP-complaint CH and RH TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current LOQL.
 - 3.9.2 Provides oversight of CCP Transportation personnel for payload and Overpack assembly and loading.
 - 3.9.3 Builds payloads from certified containers and Overpacks provided by Waste Certification Officials (WCOs) in WWIS/WDS.
 - 3.9.4 Certifies payloads for transportation to and disposal at WIPP.
 - 3.9.5 Builds shipments from approved payloads in WWIS/WDS.

4.0 INTERFACE

4.1 Initial Setup for Operations

4.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host site SMR/Designee, who will coordinate facility, QA, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site safety basis requirements, radiological controls requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures and processes.
- [D] Mobilization of project staff and equipment.

4.1.2 The Host site is responsible for the following during initial setup:

- [A] Providing office space for CCP personnel and locations and utilities for CCP equipment.
- [B] Reviewing and approving work packages for CCP equipment setup.
- [C] Providing CCP personnel with computer access, badging, and Host site required reading.
- [D] Defining and coordinating readiness activities as needed to support authorization of CCP activities at the Host site.

4.2 Routine Operations

4.2.1 Routine CCP operations will be conducted in accordance with approved CCP and Host site procedures.

4.3 Training and Qualification

- 4.3.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.3.2 Host site will schedule and provide forms as necessary for individuals that are required to take HAZWOPER physical. CCP will be responsible for the cost of the physicals.
- 4.3.3 Administrative work, such as BDR reviews that require no access to characterization activities or processes, may be completed by personnel who have not completed the Host site required site-specific training. Personnel who have not completed Host site required site-specific training will not be allowed unescorted access to the characterization activities.
- 4.3.4 CCP and Host site personnel assigned to field operations must complete the Host site required site-specific training. The SMR will ensure that the Oak Ridge site-specific training documentation is sent to CCP Training and notification is made to the VPM.
- 4.3.5 Both the CCP training and Host site required site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.3.6 A LOQI will be monitored by the CCP VPM to confirm CCP and Host site personnel assigned to CCP to perform work are qualified.

4.4 Employee Monitoring

- 4.4.1 CCP employees will be monitored in accordance with Host site radiation protection program and TWPC procedure CM-P-RP-316, *Radiological Worker Training*.
- 4.4.2 CCP employee health and safety will be monitored by Host site Health and Safety program in accordance with 10 Code of Federal Regulation (CFR) Part 851, *Worker Safety and Health Program* and TWPC procedure, CM-A-IS-001, *Worker Safety and Health Program*.

4.5 Container Management

4.5.1 The Host site provides container movement and storage compliant with the Documented Safety Analysis (DSA).

4.5.2 The Host site provides the dose rate and surface contamination information necessary to certify TRU waste containers for disposal.

4.5.3 All waste container identification numbers will begin with a unique site identifier (e.g., X10C, NFSS, etc.).

4.5.4 CCP performs container management throughout the CCP characterization process in accordance with CCP-TP-068, *CCP Standardized Container Management*, or CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*.

4.5.5 CCP AK personnel will maintain a list of characterization-eligible containers from each waste stream identified. When repackaging or VE of a waste container is required, the following container Identification (ID) scheme will be followed as applicable.

[A] When the waste from one TRU input container results in one TRU output container, the container ID from the Input container is to be used with the addition of an "A" suffix as the ID number on the output container (e.g., input container is X10C0057, the output container will be labeled as X10C0057A). This scheme is also to be applied to re-label waste containers that do not require repackaging or VE.

[B] When the waste from one TRU input container results in the creation of two or more TRU output containers, a standard convention of adding a sequential single or, if required, double letter suffix to the input container's ID number is used to label the TRU output containers produced (e.g., input container is X10C0057, the first output container is X10C0057A, and the second output container is X10C0057B).

- [C] When the waste from two or more TRU input containers from the same waste stream are combined into one output container, the container ID number from the first input container is used with the addition of an "A" suffix as the ID number on the TRU output container (e.g., X10C0057 and X10C0059 are combined into one output container. X10C0059 was the first drum repackaged. The output container is X10C0059A).
- [D] When prohibited items are segregated and placed into a separate output container from the bulk of the waste, a new container ID is applied to the segregated waste container. Prohibited items from more than one input waste container may be placed into the segregated waste container provided the input containers are from the same waste stream.
- [E] CCP AK personnel are to be notified as soon as is practical of waste container ID number changes resulting from the actions in steps 4.5.5[A] through [D].

4.5.6 Host site will notify CCP when any drum configuration is changed externally or internally.

4.6 Deficiencies and Nonconformances

4.6.1 CCP-Identified Deficiencies and Nonconformances

NOTE

The NWP QA Engineer will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If CCP personnel identify a nonconformance condition associated with a waste container during the CCP characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] If the deficiency or nonconformance is an issue that will be resolved by CCP, then CCP will provide notification (e.g., verbal or e-mail as requested by the Host site) to the Host site SMR/Designee. The Host site SMR/Designee may request any supporting documentation needed by the Host site. CCP will ensure appropriate closure of the deficiency. A copy of any CCP NCR related to DOE TRU waste at the

TWPC will be provided to the Host site SMR/Designee upon request.

- [C] If the deficiency or nonconformance cannot be resolved by the CCP (e.g., does not meet TRU waste acceptance criteria), then the specific container will be returned with all required documentation to the Host site for disposition. Once the specific container(s) have been returned to the Host site, the NCR will remain open if the container will be remediated and returned to CCP or will be closed if the condition is such that the container will not be returned to CCP (e.g., NDA indicates the container is less than 100 nanocuries per gram [nCi/g] TRU alpha activity concentration). CCP will not apply CCP HOLD TAGS to those containers which are returned as permanent rejects from CCP. Instead, CCP will affix a physical indicator (sticker or tag) that the container is returned and not certifiable for shipment to WIPP.

4.6.2 Host Site-Identified Deficiencies and Nonconformances

- [A] If Host site personnel identify a nonconforming condition during container movement or handling (e.g., missing container identification tag, duplicate container number), Host site personnel will initiate nonconformance documentation in accordance with the Host site QA Program.
- [B] The SMR will ensure a copy of any NCR affecting the CCP program is provided to the SPM for incorporation into the CCP Nonconformance Tracking System (as required).
- [C] The SMR will notify the CCP ORNL PM and VPM of any procedure deficiencies, identified by TWPC personnel, which relate to characterization activities.
- [D] The SMR will notify the Transportation Certification Official (TCO) or Mobile Loading Unit Team Lead and the VPM of any procedure deficiencies, identified by Host site personnel, which relate to payload assembly or loading activities.

4.7 Remote-Handled (RH) Waste Program

4.7.1 CCP will perform waste characterization on RH waste utilizing AK, VE, RTR, DTC, waste sampling and analysis, and FGA as described in the applicable sections of this document.

4.7.2 CCP will provide preliminary canister loading build lists for storage purposes as the containers are pending certification.

4.8 Visual Examination (VE)

4.8.1 CCP will conduct VE Operations in accordance with CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*, as needed, or CCP-TP-500, *CCP Remote-Handled Waste Visual Examination* using a facility provided by the Host site.

4.8.2 Qualified Host site personnel will manipulate waste as requested by the CCP VE operator(s) during the VE process.

4.8.3 VE operators will make notifications to the Host site as necessary to comply with the Host site safety basis. These Notifications will be made to Host site management and the VPM.

4.8.4 The Host site will perform all maintenance and repairs to the VE facility.

4.8.5 The Host site will provide personnel to qualify and perform VE in accordance with CCP-TP-113 or CCP-TP-500, if applicable.

4.9 Real-Time Radiography (RTR)

4.9.1 CCP will perform RTR using a CCP-provided unit(s). Containers rejected by RTR will be dispositioned consistent with the requirements of Section 4.6.

4.9.2 CCP may perform screening services using a CCP provided unit(s) to provide information on prohibited items for use in TWPC repackaging operations. CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*, will be used for RTR screening operations. The report provided from CCP-TP-066 will include any prohibited items or conditions, including all liquids identified, during the scan.

- 4.9.3 RTR operators will make notification to the Host site as necessary to comply with the Host site Safety Basis. These Notifications will be made to Host site management and the VPM.
- 4.9.4 The Host site is to support the CCP VPM with the construction of RTR capability demonstration drums as required.
- 4.10 Filter Inspection/Filter Change Out
 - 4.10.1 CCP Personnel will inspect container filters as part of container acceptance and will document whether the filter is a WIPP-approved filter and provide the documentation to the CCP VPM.
 - 4.10.2 If required, filter change out will be performed by Host site personnel and documentation will be provided to the CCP VPM.
- 4.11 Nondestructive Assay (NDA)
 - 4.11.1 The Host site will provide support for CCP participation in the PDP. This support includes preparation of the test drums, delivery and pick-up of the drums to/from the CCP NDA equipment, and responsibility for PDP source control.
 - 4.11.2 CCP will perform NDA using a CCP-provided unit or multiple units as required. Containers rejected by NDA will be dispositioned consistent with the requirements of Section 4.6.
 - 4.11.3 NDA operators will make notifications to the Host site as necessary to comply with the Host site safety basis. These Notifications will be made to Host site management and the VPM.
 - 4.11.4 CCP will provide the TWPC with access to validated BDRs for disposal of LLW/MLLW from the certified program.
- 4.12 Radiological Characterization (Dose-to-Curie [DTC])
 - 4.12.1 The Host site will provide technical support for RC efforts based on the use of AK for stored RH TRU waste or sampling and analysis.
 - 4.12.2 CCP will provide qualified personnel, including Host site personnel, to perform RC activities.

4.12.3 DTC operators will make notifications to the Host site as necessary to comply with the Host site safety basis. These notifications will be made to Host site management and the VPM.

4.12.4 The Host site will provide support to the CCP for performing calibration of RC instrumentation. This support includes delivery of surrogate drums and source control as needed.

4.13 Chemical Waste Sampling and Analysis Methods

4.13.1 If the Permittees determine that additional characterization is necessary using chemical sampling and analysis, the Permittees shall direct the generator/storage site to provide the Permittees with the following documentation:

- Sampling and analysis plan
- EPA SW-846 test method(s), or functionally equivalent test method(s) to be used
- Identification of the laboratory(ies) that will be performing the test(s)

4.13.2 Upon the Permittees written approval of the sampling and analysis plan, the generator/storage site shall implement the sampling and analysis plan.

4.14 Flammable Gas Analysis (FGA)

4.14.1 FGA is for transportation only and will be performed using approved DOE/WIPP procedures by personnel trained under the CCP Qualification Program.

4.14.2 FGA operators will make notifications to the Host site as necessary to comply with the Host site Safety Basis. These notifications will be made to Host site management and the VPM.

4.15 Source Control

4.15.1 CCP will provide a list of reference sources required for calibration of NDA systems used by CCP.

- 4.15.2 The Host site will be responsible for all reference sources. Responsibilities consist of inventory control, storage, shipment, and usage. The Host site will provide CCP the number of sources, location, isotopic distribution with activity levels, and the names of the custodian and authorized users, as required.
- 4.15.3 The Host site will be responsible for providing radiological control support associated with the reference sources. This support consists of maintaining the radioactive materials area (RMA) postings, periodic surveys, and performing a semi-annual leak check on the sources.
- 4.15.4 The Host site personnel will deliver the sources to qualified CCP personnel for loading into the matrix drums. CCP personnel will be trained as users of the sources to the Host site procedures.
- 4.15.5 The Host site will provide support for the CCP participation in the PDP. This support includes maintaining trained PDP coordinators, preparation of the test drums, delivery and pick-up of the drums to/from the CCP NDA equipment, and responsibility for PDP source control. Host site support will be coordinated by the Host site SMR/Designee.
- 4.15.6 The Host site will ensure sources procured by CCP receive receipt inspection by NWP QA prior to entering Host site source inventory control.
- 4.16 Acceptable Knowledge (AK)
 - 4.16.1 CCP records personnel will maintain the auditable AK record necessary to support the AK Summary Report in accordance with the Hazardous Waste Facility Permit (HWFP), Attachment C, WAP, Remote-Handled TRU Waste Characterization Program Implementation Plan (WCPIP), and the QAPD.
 - 4.16.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005 and/or DOE/WIPP-02-3214.
 - 4.16.3 Host site/generator personnel assist CCP AK personnel with AK collection.
 - 4.16.4 The Host site ensures AK source documents provided to CCP have been reviewed for controlled/sensitive information, as necessary.

4.16.5 CCP submits AK documents to classification, public release, and export control review, as necessary.

4.16.6 AKAs are performed in accordance with CCP-TP-005.

- [A] SPM provides SMR with the AKA results.
- [B] SMR distributes results of the AKA to designated cognizant personnel (CP) for review and comment.
- [C] AKE resolves comments with SMR and CP.
- [D] SMR concurs with final AKA in writing.

4.16.7 CCP submits new or revised AK Summary Reports to the SMR/Designee for review and concurrence.

4.16.8 The SMR ensures CP reviews the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.

4.16.9 Host site/generator CP attends a briefing on new or revised AK Summary Reports.

4.16.10 CCP AK personnel and Host site/generator personnel develop an IWMDL for each waste stream. Each IWMDL will include facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and decommissioning (D&D) operations

- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP
- 4.16.11 The SMR ensures POCs/SMEs are assigned to review the new or revised IWMDLs for accuracy and completeness and provide written comments as appropriate.
- 4.16.12 The AKE and CP resolve comments and questions.
- 4.16.13 Host site/generator personnel notifies the SPM and AKE in writing of any new or revised waste management activities that would necessitate a change to the IWMDL.
- 4.16.14 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AK Summary Report is needed.
- 4.16.15 The Host site will not provide any waste container to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repackage the container.
- [A] The work document(s) provided to the AKE will contain the following information at a minimum:
- Identification (including revision) of the work document(s) used to generate the container
 - Type of activity (e.g., packaging/repackaging only, remediation, treatment)
 - Amount (estimated) and type (if known) of liquids
 - Type and quantity (estimated) of absorbents used
 - Type and quantity (estimated) of neutralization agents used
 - Any unexpected conditions or reactions encountered
 - General description of waste items

- Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
- Filter data including model and quantity used
- Parent container identification

4.16.16 At a minimum of once per calendar quarter, the SMR will review current IWMDLs and provide written assurance to the CCP SPM that the list is up to date **OR** provide necessary documentation to revise the list for waste streams expected to generate additional containers of TRU waste or if containers in the waste stream will be repackaged or remediated. Revision to the IWMDL can serve to meet the Quarterly SMR IWMDL notification requirement.

4.17 Data Validation and Reconciliation

4.17.1 Wherever CCP has obtained the services of another CBFO-certified TRU Waste Program, that program will provide CCP with BDRs completed through data generation level (DGL) reviews in accordance with their own programmatic documents.

4.17.2 CCP will provide project level validated data packages for NDE, NDA, VE, RC, and FGA.

4.17.3 The CCP SPM, and AKE will perform data reconciliation with applicable data quality objectives (DQOs) using CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*, and CCP-TP-506, *CCP Preparation of the Remote-Handled Transuranic Waste Acceptable Knowledge Characterization Reconciliation Report*.

4.18 Measuring and Test Equipment (M&TE)

4.18.1 M&TE used by the CCP will be controlled and maintained in accordance with CCP-QP-016, *CCP Control of Measuring and Testing Equipment*.

4.18.2 The Host site will make available National Institute for Standards and Technology (NIST)-traceable calibration services for M&TE to the CCP. The Host site will maintain records on M&TE calibration in accordance with the Records Inventory and Disposition Schedule (RIDS). Copies of the Certificates of Calibration will be made available to the CCP VPM and CCP M&TE Custodian prior to

issuing M&TE to CCP for use.

- 4.18.3 For Host site M&TE furnished for use in the CCP program, the Host site SMR or Designee will provide notification to the CCP VPM when M&TE are added, deleted, found out-of-tolerance/defective, or failed calibration.
- 4.18.4 When notified of an as found, failed calibration CCP will perform an extent of condition review to assess its impact on any of the characterization processes, initiate an NCR (if applicable) and provide this info to the Host site SMR/Host site M&TE Custodian.
- 4.18.5 The Host site SMR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.
- 4.18.6 CCP will provide a recall notification for CCP M&TE that requires calibration to the Host site SMR/M&TE Custodian.

4.19 Work Standards

- 4.19.1 CCP operations personnel will work under the Host site Lockout/Tagout procedure.
- 4.19.2 CCP and Host site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste characterization and certification activities.
- 4.19.3 Host site procedures and work packages will be used for non-waste characterization activities (e.g., equipment repairs).
- 4.19.4 CCP operations personnel will operate in accordance with CCP-PO-005.
- 4.19.5 CCP personnel will comply with applicable Host site procedures for activities they perform outside of the CCP system of controls.
- 4.19.6 CCP personnel will work under the Host site safety basis and work control standards. Maintenance work control activities on Host site-supplied equipment and CCP owned/leased equipment will be controlled using Host site work authorization procedures.

- 4.19.7 CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, CCP-PO-026, *CCP Configuration Management*, and CCP-TP-140, *CCP Equipment Maintenance* will be followed in addition to the requirements of step 4.19.6 for CCP owned/leased equipment.
- 4.19.8 The Host site will not change the configuration of any characterization equipment used by CCP – regardless of ownership – without first obtaining written concurrence from the CCP VPM.
- 4.19.9 CCP personnel will participate in the Host site bioassay program. CCP personnel involved in VE of waste will provide routine samples at a frequency agreed upon between the Host site and NWP Radiological Safety organization. All other CCP personnel will provide samples as requested under the routine/random program established by the Host site. All CCP personnel will submit bioassay samples if required by the Host site Radiation Protection Program (RPP) to establish a baseline for activities at the Host site.
- 4.19.10 The CCP ORNL Project Manager or CCP VPM will notify the Host site SMR/Designee when new CCP personnel (NWP and subcontractors) are assigned to work at the TWPC. This notification will occur as soon as is practical.
- 4.19.11 The CCP ORNL Project Manager or CCP VPM will notify the Host site SMR when CCP personnel, NWP and subcontractors leave the TWPC as a result of reassignment or resignation. This notification will occur as soon as is practical.
- 4.19.12 The Host site SMR will notify affected organizations to support the arrival or departure of CCP personnel.
- 4.19.13 The CCP ORNL Project Manager or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.

- 4.19.14 Host site Radiological Controls personnel will perform routine surveys for contamination and radiation as specified in Host site policies or procedures. The CCP ORNL Project Manager or CCP VPM and appropriate Host site management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied areas. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.19.15 The Host site will immediately notify the CCP ORNL Project Manager or CCP VPM and appropriate Host site management personnel of any abnormal continuous or fixed air sample filter analysis results from any area routinely occupied by CCP personnel.
- 4.19.16 CCP will provide historical information on the operation of any CCP equipment deployed at the Host site for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.
- 4.19.17 For Host site-supplied equipment and facilities, the Host site is the Design Authority. It is expected that CCP will participate in review of hazards analysis for this equipment and facilities being provided.
- 4.19.18 For non-Host site-provided equipment, CCP will provide the Host site with information and documentation necessary for evaluation of compliance with the Host site's safety basis. CCP will be the Design Authority for the equipment. The programmatic limits for the operation of the characterization equipment are the responsibility of CCP as part of their Design Authority responsibilities.
- 4.19.19 CCP will control the procurement, development, maintenance, configuration management, and use of software used on all Host site and non-Host site-provided equipment used to develop quality-affecting data for waste characterization in accordance with CCP-QP-022.
- 4.20 Project Office TRU Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS) Data Entry
 - 4.20.1 CCP will prepare WSPFs for the subject Host site waste in accordance with CCP-TP-002.

- 4.20.2 CCP will transmit characterization and certification data using the WWIS/WDS and CCP procedures CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry* or CCP-TP-530, *CCP RH TRU Waste Certification and WWIS/WDS Data Entry*.
- 4.20.3 CCP shall submit WSPFs to the Host site for information before submittal to CBFO. The Host site will provide written concurrence on the basis of continued compliance with procedures and programs, and CBFO-certification of the CCP program.
- 4.20.4 The CCP WCO will document and certify that all TRU waste payload containers meet the requirements of the WAC, and submit the data to the WWIS/WDS for approval.
- 4.21 Transportation of Contact-Handled (CH) Waste and Remote-Handled (RH) Waste
 - 4.21.1 CCP Transportation is responsible for meeting all requirements for loading and shipping TRU waste certified by the CCP as approved in the WWIS/WDS.
 - 4.21.2 CCP transportation will direct TWPC loading of containers into overpacks according to CCP WCO listings and will provide the CCP WCO with the necessary data to complete the process, if required.
 - 4.21.3 The TWPC provides and signs on behalf of DOE the Uniform Hazardous Waste Manifest, bill of lading, make notifications as required, and required markings, labels and placards for each TRU waste shipment.
 - 4.21.4 The Host site will provide and maintain CH and RH Package Loading facilities.
 - 4.21.5 CCP Transportation will provide technical resources, TCO and qualified personnel to perform the transportation certification, preparation of the shipment, and loading of the waste for shipments.
 - 4.21.6 The Host site will provide the equipment and trained personnel required to handle waste containers for payload assembly and loading operations.
 - 4.21.7 CCP Transportation will provide documentation to the SMR certifying the waste for shipment according to CCP procedures.

4.21.8 The Host site will coordinate the shipment including providing radiation and contamination surveys on payload containers and shipping packages, entering shipment information into TRANSCOM, and scheduling shipment CVSA VI inspection and other state requirements with Tennessee state authorities.

4.22 Quality Assurance (QA)

4.22.1 All quality affecting work performed in the completion of this waste characterization, certification, and transportation scope will be in compliance with applicable DOE/CBFO-certified CCP procedures.

4.22.2 NWP QA will conduct periodic surveillances to assess compliance with applicable WIPP requirements.

4.22.3 The Host site will conduct surveillances to assess compliance with applicable procedures.

4.23 Project Control

4.23.1 CCP and the Host site will provide routine status for their respective scheduled activities.

4.23.2 CCP will maintain and provide the Host site with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.

4.24 Procedures

4.24.1 CCP will develop new or revised procedures in accordance with CCP-QP-010.

4.24.2 New technical operating procedures (procedures that operate equipment) developed by the CCP and scheduled to be used at the Host site, shall be evaluated by the Host site SMR to determine if the procedure shall be added to the Host site review list provided in Section 4.24.3.

4.24.3 The following documents and revisions to these documents will be provided to the SMR for review by SMEs/CP: If the procedure is an operational procedure that CCP is not currently operating to, the SMR may waive his review until CCP operations commence on site. When CCP operations return to the site the SMR will be provided all procedures listed below for review:

- CCP ORNL AK Summary Reports
- CCP Interface Waste Management Documents Lists
- CCP AK Assessments
- CCP ORNL WSPFs
- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-CM-013, *CCP Transportation Flammable Gas Analysis (FGA)*
- CCP-HSP-014, *CCP Health and Safety Program Implementation*
- CCP-PO-026, *CCP Configuration Management*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-018, *CCP Management Assessment*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- CCP-TP-047, *CCP Mobile IQ3 Gamma Scanner Operation*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*

- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*
- CCP-TP-164, *CCP Real-Time Radiography #7 Operating Procedure*
- CCP-TP-165, *CCP Real-Time Radiography #6 Operating Procedure*
- CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*
- CCP-TP-504, *CCP Dose-to-Curie Survey Procedure for Remote-Handled Transuranic Waste*
- CCP-TP-505, *CCP Removable Lid Canister/Neutron Shielded Canister Loading*
- CCP-TP-507, *CCP Shipping of Remote-Handled Transuranic Waste*
- CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*
- CCP-TP-512, *CCP Remote-Handled Waste Sampling*
- CCP-TP-554, *CCP Remote-Handled Grapple Pre-Operational Checks and Operation*

NOTE

Examples of CP may include, but is limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

4.24.4 Upon receipt of a document listed in step 4.24.3 the SMR/Designee will ensure the document is reviewed by CP responsible for the waste management activities relevant to the scope of the document.

4.24.5 As warranted, the SMR/Designee will provide written comments to CCP using Document Review Record (DRR) in accordance with CCP-QP-010.

4.24.6 CCP, at its direction, may request objective evidence to support the competency of Host site/generator reviewers.

4.24.7 The CCP SPM will confirm that the SMR/Designee written comments are resolved with the Host site SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.24.8 The following documents, and all revisions to these documents, will be provided to the SMR/Designee as "Notify Only" during the review process:

- CCP-PO-005, *CCP Conduct of Operations*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-TP-046, *CCP Mobile IQ3 System Calibration Procedure*

- CCP-TP-048, *CCP ORNL NDA System Data Reviewing, Validating, and Reporting Procedure*
- DOE/WIPP-02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-02-3184, *CH Packaging Operations Manual*
- DOE/WIPP-02-3185, *CH Packaging Maintenance Manual*
- DOE/WIPP-02-3284, *RH Packaging Operations Manual*
- DOE/WIPP-02-3283, *RH Packaging Program Guidance*

4.24.9 The following document and all revisions are controlled by CBFO. Upon receiving notification of issue/revision, CCP will notify the Host site for USQ screening prior to implementation at the Host site.

- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*

4.24.10 Other controlled documents used by CCP are available to the Host site SMR/Designee for information purposes at the sftp site.

4.25 Document/Records Transmittals

4.25.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as QA records will be transmitted in accordance with CCP-QP-008, *CCP Records Management*.

4.25.2 Information copies of documents to be provided to the Host site by CCP include but are not limited to:

- [A] Copies of NCRs and Issue Notices, as applicable.
- [B] Copies of ORNL AK Summary Reports.
- [C] Copies of ORNL AK source documents and source document summaries, as requested.
- [D] Copies of semi-annual trending summary reports.

- [E] Copies of QA surveillance reports.
- [F] Copies of ORNL WSPFs.
- [G] Copies of VE, NDE, and NDA data, as requested.
- [H] Copies of CCP Source/Receipt Inspection Verification Sheets and associated objective evidence for each shipment.
- [I] Information on chemical usage and copies of applicable MSDSs/SDSs as requested for inventory or reporting reasons.
- [J] A copy of the RIDS developed by CCP.
- [K] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/U.S. Environmental Protection Agency (EPA) or other regulatory audit or compliance/enforcement actions that may impact CCP's ability to characterize and transport TRU waste.
- [L] Copy of final data package to WIPP via WWIS/WDS, as requested.
- [M] Documented evidence of participating in and passing the CBFO PDP.
- [N] NMED approval of the CBFO Certification Audit Report.
- [O] EPA Tier 1 approval of CCP processes and activities at ORNL.
- [P] List of equipment requiring calibration (M&TE List)

4.25.3 Documents to be provided to CCP by Host site include:

- [A] Documentation of required training.
- [B] Documentation of training completion for CCP and Host site personnel for training received from the Host site.
- [C] Copies of AK source documentation requested by CCP.

- [D] Radiological dose rate and surface contamination results on waste drums as needed to support WWIS/WDS data entry.
- [E] Radiological information as described in Section 3.1.2[A].
- [F] Copies of NCRs, deficiency reports, or other nonconformance documentation per Section 4.6.
- [G] Copies of the results of Host site assessments pertaining to CCP.
- [H] Copies of calibration certifications for M&TE used by CCP.
- [I] Copies of QA surveillance reports.
- [J] Copies of the Uniform Hazardous Waste Manifest, bill of lading, and Shipment Notifications.
- [K] Any documentation required by CCP to perform its scope of work, including correspondence pertaining to characterization activities, and Host site/generator waste management activities.
- [L] Host site generated AB documentation concerning CCP related activities and equipment, including USQ's.

4.26 Authorization Basis (AB) and Configuration Management

- 4.26.1 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved, Host site DSA.
- 4.26.2 CCP has primary responsibility to control CCP operations and CCP equipment configurations to ensure compliance with Host site procedures that protect the personnel, public, and environment.
- 4.26.3 For CCP provided equipment, CCP will provide the documentation necessary for Host site to perform the evaluation against its safety analysis. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and the Host site.

4.26.4 For Host site provided equipment, CCP will review operational and AB documentation, including USQs, to ensure the safety of CCP personnel while operating the equipment.

4.26.5 All changes to Host site equipment operated by CCP and CCP Vendor owned equipment will be controlled by the Host site Configuration Management and Work Control Program to ensure appropriate AB evaluations are conducted and associated controls are established.

4.26.6 The Host site will submit all changes to AB requirements that affect CCP operations for review and concurrence by CCP prior to implementation.

4.27 Notification

4.27.1 The Host site has primary responsibility to notify CCP prior to changes in the Host sites facilities used by CCP for characterization activities or changes that may impact operations.

4.27.2 The Host site has primary responsibility to notify CCP prior to changes to Host site/generator policies, processes, or procedures that may affect CCP characterization activities or operations.

4.27.3 The Host site has primary responsibility to notify CCP if new information becomes available that impacts the characterization of TRU waste streams.

4.27.4 CCP has primary responsibility to ensure changes to equipment are in accordance with CCP-CM-001.

4.27.5 CCP has primary responsibility to notify the Host site prior to configuration changes to CCP or CCP vendor-owned equipment.

4.27.6 The Host site has primary responsibility to notify CCP when repairs or modifications are needed on the CH or RH transportation trailers, packaging equipment, or casks.

4.27.7 CCP is responsible for performing or coordinating repairs and modifications to the CH or RH transportation trailers, packaging equipment, or casks.

4.28 Procurement

4.28.1 The TWPC is shown as a supplier of procurement services on the NWP QSL. The TWPC may procure, inspect, and perform receipt inspection of whatever items are listed in the most current NWP QSL for the CCP scope of work. The TWPC will perform these activities in accordance with its QSL-accepted program.

4.28.2 The TWPC shall use the specifications found on the CCP sftp site when ordering gas standards used for FGA operations.

4.28.3 The Host site shall ensure items procured by CCP receive receipt inspection, as necessary.

4.29 Occurrence Reporting and Processing System (ORPS) and Price-Anderson Amendments Act (PAAA)

4.29.1 CCP, through NWP established programs, maintains the responsibility for reporting potential Price Anderson Amendments Act (PAAA) issues resulting from the certification and transportation of TRU waste by CCP. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP at the Host site.

4.29.2 The Host site maintains the responsibility for reporting potential PAAA issues resulting from issues with safe operation of CCP characterization activities (e.g., Radiation Safety, IS&H, Industrial Hygiene, Maintenance, Lockout/Tagout, Conduct of Operations, etc.) at the Host site. This includes filing any ORPS reports resulting from issues with safe operations of CCP characterization activities at the Host site.

4.29.3 Both the Host site and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operation of characterization activities by CCP at the Host site.

4.29.4 Both the Host site and CCP shall invite the other to participate in the investigation of any waste characterization event that results in an ORPS or PAAA report.

4.29.5 Both the Host site and CCP shall support and participate in investigations when CCP characterization activities result in an ORPS or PAAA report.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP will be maintained in accordance with CCP-QP-008 and dispositioned in accordance with and CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.
- 5.3 The Host site will maintain the following records in accordance with Host site requirements. The list includes, but is not limited to, the following:
 - 5.3.1 MSDS/SDS
 - 5.3.2 Calibration Certifications

6.0 OVERSIGHT

NOTE

Through the Inter-Entity Work Order (IEWO) contract between ORO and NWP, and the associated SOW, the ORO has delegated the authority to characterize and certify TRU waste to be shipped to the WIPP. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator on behalf of DOE. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the CH and RH WAC and WAP.
- 6.2 Following successful completion of the CBFO certification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP SPM. The CCP SPM and NWP QA will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any finding or other deficiencies against the CCP scope of work.
 - 6.3.2 Document and perform corrective actions in accordance with applicable NWP issues management procedures.
 - 6.3.3 Provide Host site QA with CCP actions to correct the identified deficiencies.
 - 6.3.4 NWP QA will maintain an information file of the Host site surveillance reports conducted on the CCP scope of work.

Figure 1 – Nuclear Waste Partnership – TWPC

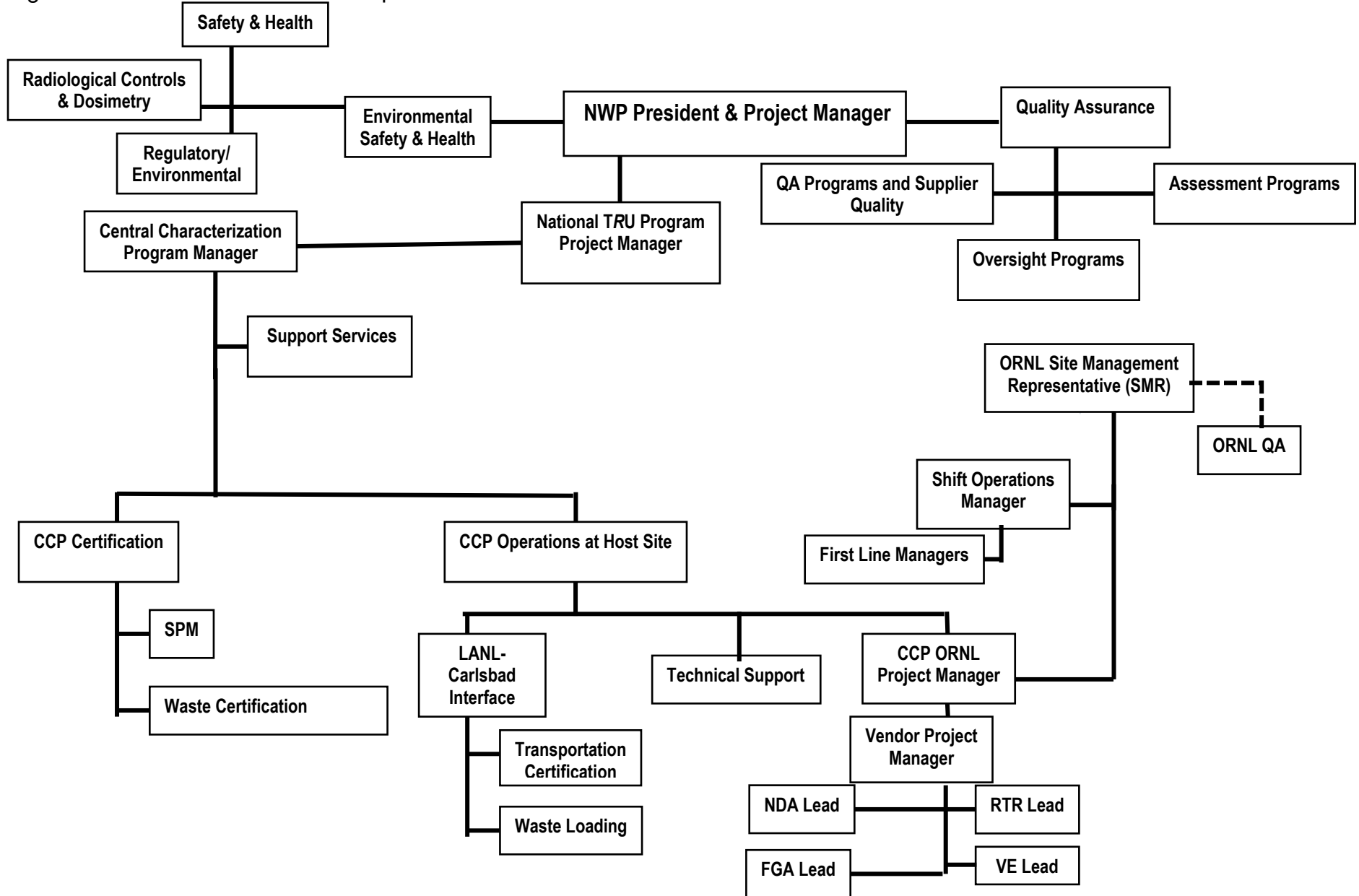
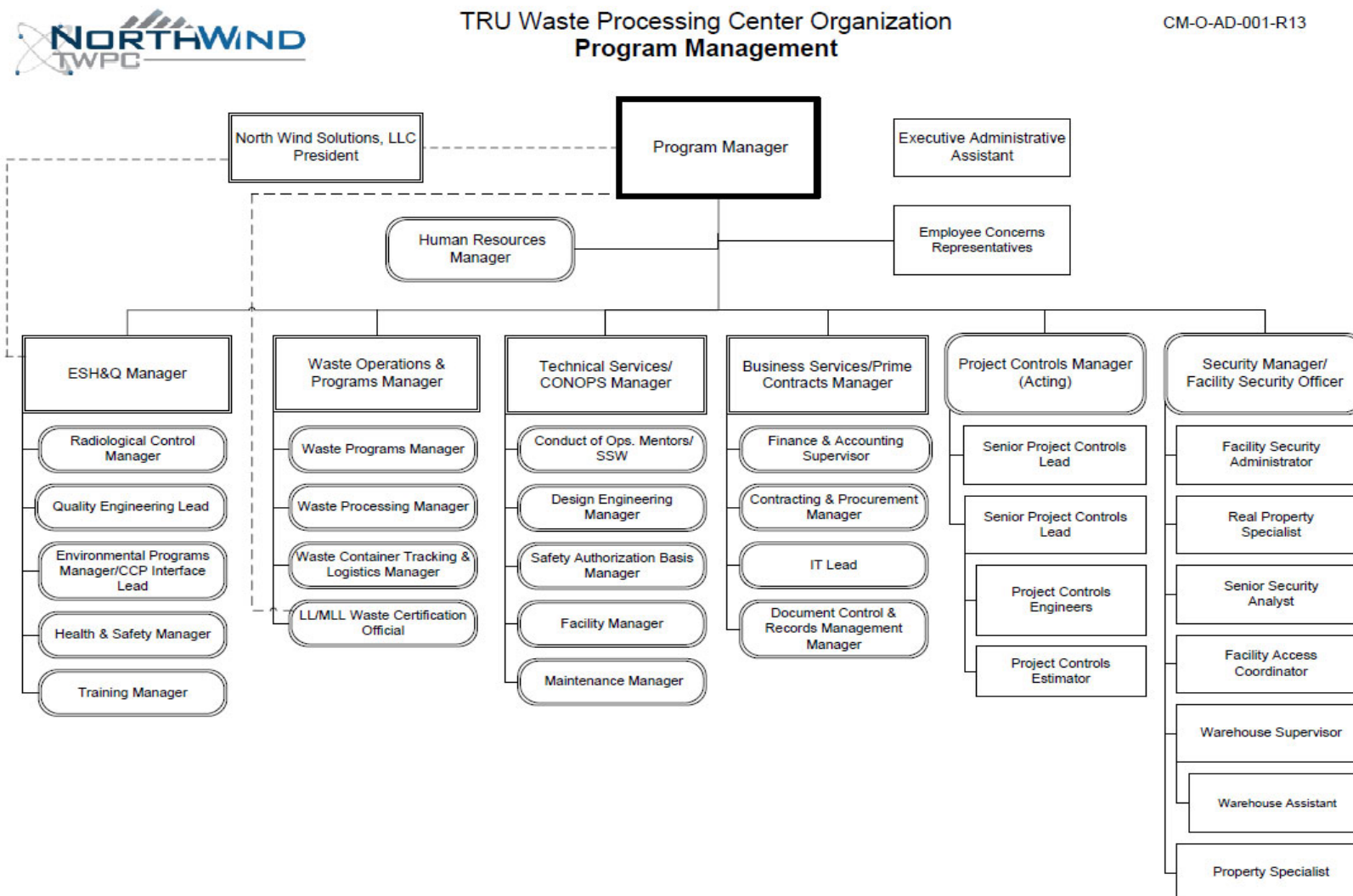


Figure 2 – TWPC Management Organization Chart



*Dual Role
sub – subcontractor

CCP-PO-510

Revision 4

CCP/SNL Interface Document

EFFECTIVE DATE: 02/09/2022

Richard Kantrowitz

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	11/18/2010	Initial issue.
1	01/22/2014	Revised to remove references to Head Space Gas (HSG) sampling and SUMMA analysis, and to update reference documents.
2	09/29/2015	Revised to clarify roles and additional responsibilities items in Sections 3.4, 3.6, 4.7, and 4.16. Also revised the Training and Qualification section, and incorporated other editorial changes.
3	11/16/2016	Changed Project Manager (PM) to Site Project Manager (SPM) in step 4.3.2[A] and added to step 4.7.12 clarification for the Interface Waste Management Documents List (IWMDL) quarterly review is for waste streams expected to generate additional containers of transuranic (TRU) waste or if containers in the waste stream will be repackaged or remediated.
4	02/09/2022	Incorporate CCP-SO-127.

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1.0 PURPOSE

The Central Characterization Program (CCP) is a mobile program designed to characterize, certify, and transport transuranic (TRU) waste from various Department of Energy (DOE) sites to the Waste Isolation Pilot Plant (WIPP) in New Mexico. The CCP is operated by Nuclear Waste Partnership (NWP) at the direction of the DOE Carlsbad Field Office (CBFO) (See Figure 1, Nuclear Waste Partnership – RH).

CBFO has deployed the CCP to the Host site Sandia National Laboratory (SNL). CCP has been deployed to this site to process TRU waste.

This document defines the interfaces between the CCP and the Host site organization(s) necessary to perform this work. This document is invoked via a Statement of Work (SOW) between the Host site organization and NWP. This document is intended to clarify and expand on details contained in the upper tier SOW and program documents. It is not intended to be used in lieu of a task-specific SOW.

1.1 Scope

CCP has primary responsibility for waste characterization activities. CCP services include compilation, reporting, and confirmation of Acceptable Knowledge (AK), Radiological Characterization, Visual Examination (VE), Data Validation and Verification, Waste Certification, WIPP Waste Information System (WWIS)/Waste Data System (WDS) Data Entry, and Waste Transportation Packaging and Shipment.

In providing these services, CCP may opt to use other CBFO-certified TRU programs. CCP will accept batch data reports (BDRs) validated through the data generation level from these other certified programs and perform all project office activities in accordance with the CCP program.

These services will be performed with CCP and/or Host site equipment with appropriate procedures. All services provided by CCP will comply with remote-handled (RH) TRU requirements delineated in 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); and *Waste Isolation Pilot Plant Hazardous Waste Facility Permit, Waste Analysis Plan* (WAP), including those requirements pertaining to waste disposal and transportation. This work will be performed under CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, that meets requirements defined in DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD).

The Host site may augment CCP characterization efforts as requested by CCP. Where required, all augmented services provided by the Host site shall comply with CCP-certified procedures.

Host site maintains ownership of the waste and responsibility for its disposal. This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP Co-Permittees.

CCP will coordinate with the Host site to ensure that requirements for safety, (including Radiological Control, Emergency Management, Industrial Safety, and Industrial Hygiene [IH]), security, safety basis, environmental permits, and other areas are met for CCP activities, and that CCP activities support the scheduled objectives.

Throughout this document the Host site contractors' responsibilities are limited to the specific CCP activities being conducted within their facilities.

The CCP will certify DOE RH-TRU waste at the Host site in accordance with the certification authority that has been granted by the DOE/CBFO. This certified waste will be shipped directly to WIPP for disposal.

The CCP will certify DOE contact-handled (CH) TRU waste for shipment to Idaho National Laboratory (INL) for certification and disposal at WIPP.

This document addresses specific requirements for the following areas:

- Training and Qualification
- Container Management
- Deficiencies and Nonconformances
- VE
- Radiological Characterization (includes dose-to-curie methodology)
- Source Control
- AK
- Data Validation and Reconciliation
- Measuring and Test Equipment (M&TE)
- Work Standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- Waste Certification and WWIS/WDS Data Entry
- Transportation
- Authorization Safety Basis and Configuration Management

The Host site will report conditions or concerns that have or may have safety, health, QA, security, operational or environmental implications to CCP and DOE/Albuquerque. CCP shall report their similar issues to the Host site and to DOE/CBFO.

2.0 REQUIREMENTS

This document implements the applicable requirements of the following:

- DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant (WAC)*
- DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan (WCPIP)*
- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-026, *CCP Inspection Control*

3.0 RESPONSIBILITIES

3.1 Initial Setup

3.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host Site Technical Representative (STR)/Designee, who will coordinate facility, QA, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with Host site safety basis requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the Host site.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures or processes.
- [D] Mobilization of project management and staff.

3.2 CCP Operations

3.2.1 CCP is responsible for the following activities to support operations:

- [A] Performing system start-up and calibration of characterization equipment at the Host site.
- [B] Performing safety walk-downs, management, and laboratory assessments prior to operation.
- [C] Responding to and resolving assessment and surveillance findings for CCP startup activities.
- [D] Ensuring CCP and Host site personnel are trained and qualified in accordance with the requirements specified in Section 4.1.
- [E] Successful completion of DOE/CBFO Certification Audit.
- [F] Providing drum tracking support for the drums introduced into characterization activities.

- [G] CCP, through NWP established programs, maintains the responsibility for reporting potential Price-Anderson Amendments Act (PAAA) issues resulting from the certification of TRU waste by CCP at the Host site. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification of TRU waste by CCP at the Host site. CCP shall allow the Host site to participate in the investigation of any waste certification event that results in an ORPS or PAAA report.
- [H] CCP shall support and participate in Host site investigations when CCP characterization activities result in a Host site-initiated ORPS or PAAA report.
- [I] CCP shall maintain records in accordance with CCP-QP-008, *CCP Records Management*, and CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.

3.2.2 The Host site provides the following support for CCP activities:

- [A] Radiological controls as needed to support characterization activities, including:
 - Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide approved survey reports to the CCP Site Project Manager (SPM), as required.
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation, as required.
 - Radiological Technical Work Documents (RTWDs) to support CCP activities, as required.

- Bioassay sample collection, evaluation, and reports. Bioassay reports will be provided to the CCP Vendor Project Manager (VPM) within 90 days of sample collection, if applicable.
 - Radiological source controls.
 - Radiological Technicians for monitoring.
 - Responsible for secondary generated waste which is not TRU waste.
 - Personal Protective Equipment, as necessary.
 - Personnel facilities to accommodate the characterization and loading process.
- [B] Provides site-specific training, as needed, to ensure safe operations within the facility.
- [C] Provides ES&H support, as needed.
- [D] Provides Fire Protection and Emergency Management support, as needed.
- [E] Provides Nuclear Regulatory Commission License oversight.
- [F] Provides drum handling, inventory control, and storage location tracking.
- [G] Provides personnel to be trained and qualified under the CCP program as needed to support CCP activities such as AK, VE, and radiological characterization, if applicable.

NOTE

Sandia National Laboratories/New Mexico is responsible for classification releases of AK summary reports and source documents.

- [H] Performs document reviews as required to allow the public release of documents such as the AK Summary Report. The Host site maintains the responsibility for reporting potential issues resulting from issues with safe operation of CCP characterization activities (e.g., Technical Specifications, Radiation Safety, Industrial Safety, IH, Maintenance, Lockout/Tagout (LO/TO), Conduct of Operations, etc.) at Host site. The Host site shall allow CCP to participate in investigations resulting in reports from issues with safe operation of CCP characterization activities at Host site.
- [I] The Host site will be allowed to participate in CCP investigations when a waste certification event results in a CCP-initiated ORPS or PAAA report.
- [J] Provides adequate space and file storage capacity for CCP personnel to maintain records.

3.3 CCP Site Project Manager (SPM)

- 3.3.1 Functions as CCP's primary interface and point-of-contact between CCP and the Host site for all waste characterization, certification, and transportation activities.
- 3.3.2 Ensures CCP and Host site personnel are trained and qualified to perform WIPP-compliant TRU waste characterization and transportation activities at the Host site prior to commencement of work activities.
- 3.3.3 Confirms sufficient characterization equipment is available to perform the required characterization activities at the Host site.
- 3.3.4 Provides the AK Summary Report for DOE waste characterized by the CCP to the Host site STR/Designee.
- 3.3.5 Notifies the Host site STR/Designee of any potential ORPS or Noncompliance Tracking System-Reportable PAAA issues resulting from the certification of TRU waste by CCP at SNL.
- 3.3.6 Provides information copies of NCRs, corrective action documentation and CCP QA semiannual trending reports to the Host site STR/Designee, as requested.

- 3.3.7 Works in conjunction with Host site operations to establish and maintain reasonable and appropriate throughput of waste containers.
- 3.3.8 Ensures that project level verification and validation of BDRs are completed.
- 3.3.9 Provides status on CCP characterization operations to the Host site STR/Designee.
- 3.3.10 Reviews required software QA per CCP-QP-022, *CCP Software Quality Assurance Plan*.
- 3.4 Acceptable Knowledge Expert (AKE)
 - 3.4.1 Collects, compiles reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.4.2 Ensures CCP has obtained necessary container information prior to characterization.
- 3.5 CCP Quality Assurance (QA)
 - 3.5.1 Functions as CCP's primary interface and point-of-contact for QA matters between CCP, Host site, DOE/Albuquerque, and DOE/CBFO.
 - 3.5.2 Validates Nonconformance Reports (NCRs) and corrective action documentation generated by CCP personnel performing characterization activities at the Host site.
 - 3.5.3 Ensures that nonconformances are dispositioned in a timely manner in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
 - 3.5.4 Ensures that programmatic deficiencies are documented for corrective action and resolution in accordance with NWP issues management requirements.
 - 3.5.5 Ensures receipt inspection per CCP-QP-026, *CCP Inspection Control*, of procured items and services is performed when procured by CCP.
 - 3.5.6 Provides the CCP SPM with a copy of the semi-annual trending summary reports per CCP-QP-019, *CCP Quality Assurance Reporting to Management*.

- 3.6 Host Site Subcontract Technical Representative (STR)/Designee (Host Site Management Representative)
 - 3.6.1 Functions as the Host site's primary interface and point-of-contact between the Host site and CCP.
 - 3.6.2 Ensures cognizant Host site and generator Point of Contacts/Subject Matter Experts (SMEs) are identified and available as necessary to support the review of CCP documents defined in step 4.16.3.
 - 3.6.3 Coordinates review, provides comments, and approves comments resolutions on documents listed in Section 4.16.3. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.
 - 3.6.4 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
 - 3.6.5 Ensures safety reviews that may be needed for proposed modifications to CCP hardware, software, or procedures are prepared and approved by the appropriately qualified Host site personnel prior to CCP implementing the proposed modification.
 - 3.6.6 Ensures needed site infrastructure support, such as radiological, industrial safety and IH, is available for waste characterization.
 - 3.6.7 Ensures documentation of completed Host site-specific training is delivered to the CCP SPM.
 - 3.6.8 Coordinates review, provides comments, and approves comment resolutions on procedures listed in Section 4.16.3 for the purpose of ensuring facility safety requirements are met.
 - 3.6.9 Provides local support to CCP, including supporting characterization operations as needed. Also provides personnel to support the CCP AK Experts (AKE) in the collection of required documents and procedures as needed.
 - 3.6.10 Ensures that periodic QA surveillances of CCP operations by the Host site are conducted and reported to CCP.
 - 3.6.11 Distributes the CCP documents listed in Section 4.16.3 to Host site reviewers as required by the Host site administrative controls.

- 3.6.12 Reviews and concurs in accordance with CCP-QP-010, on documents in Section 4.16.3 of this Interface Document.
- 3.6.13 Provides facilities, construction services, utilities, phone services, office services, and supplies.
- 3.7 Nuclear Facility Manager (NFM) (Host site position)
 - 3.7.1 Responsible for equipment, structures, activities, processes, and personnel assigned nuclear facilities.
 - 3.7.2 Develop and maintain the authorization basis.
 - 3.7.3 Maintains compliance with the authorization basis documents.
 - 3.7.4 Oversees the authorization of work in assigned facilities.
- 3.8 CCP Vendor Project Manager (VPM)
 - 3.8.1 Obtains Host facility management daily release/approval prior to performing CCP operations.
 - 3.8.2 Monitors the List of Qualified Individuals (LOQI) daily (when characterization activities are being performed) to confirm that only qualified personnel perform waste characterization activities.
 - 3.8.3 Functions as CCP's primary interface and point-of-contact between CCP and the Host site STR/Designee for characterization field operations.
 - 3.8.4 Provides pre-operation briefings when activities are being conducted.
 - 3.8.5 Ensures that in-process documents and the documents listed in Section 4.17.2 are transmitted to the CCP Site Project Office as soon as practicable in accordance with CCP-QP-008.
 - 3.8.6 Ensures applicable Material Safety Data Sheets (MSDSs) are maintained and available to support operations.
 - 3.8.7 Provides oversight of field operations to ensure safe, efficient operations.
 - 3.8.8 Supervises day-to-day TRU waste characterization activities.
 - 3.8.9 Notifies the CCP SPM and the Nuclear Facility Manager (NFM) of any abnormal events associated with safe operation of CCP characterization activities for reporting purposes.

4.0 PROCEDURE

4.1 Training and Qualification

- 4.1.1 CCP personnel or Host site personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.1.2 CCP and Host site personnel assigned to field operations must complete the Host site-specific training. The STR will ensure the Host site-specific training documentation is sent to CCP Training.
- 4.1.3 Both the CCP training and Host site-specific training must be completed prior to the individual being assigned to perform independent work at the Host site.
- 4.1.4 Administrative work, such as BDR reviews requiring no access to the characterization activities or processes at the Host site, may be completed by personnel who have not completed the required Host site-specific training. Personnel who have not completed Host site-specific training will not be allowed unescorted access to the characterization activities.
- 4.1.5 A LOQI will be monitored daily by the CCP VPM to confirm CCP personnel and Host site personnel assigned to CCP are qualified.

4.2 Container Management

- 4.2.1 The Host site is responsible for drum movement and storage.
- 4.2.2 The Host site will provide the dose rate and surface contamination information necessary to certify the container or canister.
- 4.2.3 CCP is responsible for container management throughout the CCP characterization process.
- 4.2.4 The Host site is responsible for providing documented information to the CCP SPM on any modification to a drum or canister after closure and/or AK has been approved.

- 4.2.5 The CCP SPM will review the documented information of modified drums and will notify the STR when the drums are approved for entrance into the CCP characterization process.

4.3 Deficiencies and Nonconformances

4.3.1 CCP-Identified Deficiencies and Nonconformances

- [A] If CCP personnel identify a nonconforming condition associated with a waste container during the CCP characterization or certification process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] Programmatic deficiencies will be addressed in accordance with the NWP Issues Management process.
- [C] If the deficiency or nonconformance is an issue that will be resolved by CCP, CCP QA will ensure appropriate closure in accordance with CCP procedures. A copy of any CCP documentation related to CCP-identified nonconformances or deficiencies associated with DOE TRU waste at Host site will be provided to the Host site STR/Designee upon request.

NOTE

In some cases, Host site may perform the work required to resolve deficiencies identified in CCP NCRs and will initiate internal documentation as required by the Host site program. However, the CCP NCRs will remain open, and CCP NCR Hold Tags will remain on the affected TRU containers until resolution of the NCR condition has been confirmed by CCP under its certified program. At that point, CCP will close the NCRs and remove the NCR tags on TRU drums. Other methods used to control the affected items may include segregation and/or the use of dual independent check systems (for non-compliant RH waste packages based on the As Low As Reasonably Achievable [ALARA] principle) which utilize two separate and distinct processes and data sets for verifying waste packages are acceptable for shipment.

- [D] If the deficiency or nonconformance cannot be resolved by CCP (e.g., does not meet TRU Waste Acceptance Criteria), then the specific drum will be returned with all required documentation to the Host site for disposition. CCP will work with the Host site to resolve all issues with drums.

- [E] CCP personnel will immediately notify the CCP VPM of any abnormal event associated with the safe operation of CCP characterization activities. The CCP VPM will notify the CCP SPM and the SNL NFM and the STR of the abnormal event.
- [F] CCP QA will notify the STR/Designee of potential CCP ORPS and PAAA reports resulting from the certification of waste by CCP at SNL.

4.3.2 Host Site Identified Deficiencies and Nonconformances

- [A] Deficiencies or nonconformances identified by the Host site during this project that affect waste characterization or certification activities shall be promptly identified to the CCP SPM or CCP VPM, who will perform the actions described in Sections 4.3.1[A] or 4.3.1[B], to ensure that the deficiencies or nonconformances are documented and resolved.
- [B] For deficiencies or nonconformances that are the responsibility of the Host site to resolve, the Host site will initiate the appropriate documentation in accordance with the Host site QA program and its implementing procedures.

4.4 Visual Examination (VE)

- 4.4.1 CCP will conduct VE at the time of waste packaging or as required by the governing documents in accordance with CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*, using a facility provided by the Host site.
- 4.4.2 Host site will be responsible for all maintenance and repairs to the facility used for VE and/or repackaging operations.

4.5 Radiological Characterization

- 4.5.1 The Host site will provide a technical lead to support radiological characterization efforts based on the use of AK for stored RH-TRU waste.
- 4.5.2 CCP will provide qualified personnel, including Host site personnel, to perform radiological characterization activities.

- 4.5.3 The Host site will provide support for the CCP for performing operational checks of radiological characterization instrumentation. This support includes source control, as needed.

4.6 Source Control

- 4.6.1 No Special Nuclear Material (SNM) sources are anticipated to be required to support radiological characterization.
- 4.6.2 The Host site will be responsible for management of all radiological characterization non-SNM reference sources. Responsibilities consist of: inventory control, storage, shipment, and usage. The Host site will provide CCP the names of the custodian and authorized users when required or requested by CCP.
- 4.6.3 The Host site will be responsible for providing radiological control support associated with the CCP non-SNM reference sources. This support consists of maintaining the radioactive materials area (RMA) postings, periodic surveys and performing a semi-annual leak check on the sources as requested by CCP.
- 4.6.4 The Host site, as custodian of non-SNM sources, will provide to CCP the necessary sources for operational checks as requested. CCP personnel will be trained as users of the sources to the Host site procedures, as required.

4.7 Acceptable Knowledge (AK)

- 4.7.1 CCP records personnel will maintain the auditable AK record necessary to support the AK Summary Report in accordance with the WAP and QAPD.
- 4.7.2 CCP AK personnel collect, compile, and review AK documentation in accordance with CCP-TP-005 and/or the WCPIP.

[A] Site Management Representative (SMR) assist CCP AK personnel with AK collection.

4.7.3 CCP AK personnel and Host site/generator personnel develop an Interface Waste Management Documents List (IWMDL) for each waste stream. Each IWMDL will include facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)
- Waste inspection, testing, and characterization
- Decontamination and Decommissioning operations
- Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP

[A] The AKE develops the new or revised IWMDL in accordance with CCP-TP-005 using the existing body of AK documentation.

[B] The SMR ensures cognizant Host site/generator personnel (CP) are assigned to review the new or revised AKDL for accuracy and completeness and provide written comments as appropriate.

[C] The AKE and SMR resolve comments and questions.

[D] CCP posts the new revised IWMDL on the CCP secure file transfer protocol (sftp) site.

NOTE

This note applies to step 4.7.4. The activities of step 4.7.4 may be initiated as necessary by the AKE for existing waste streams, new waste streams, or during AK revisions/updates.

4.7.4 SPM/AKE ensures AK Assessments (AKA) are performed in accordance with CCP-TP-005.

- [A] SPM provides SMR with the AKA results.
 - [B] SMR distributes results of the AKA to designated CPs for review and comment.
 - [C] AKE resolves comments with SMR and CPs.
 - [D] SMR concurs with final AKA in writing.
- 4.7.5 CCP submits new or revised AK Summary Reports to the SMR/Designee for review and concurrence.
- [A] The SMR ensures CP review the AK Summary Report for accuracy and completeness providing comments in accordance with CCP-QP-010.
- 4.7.6 A Host site/generator CP attends a briefing on new or revised AK Summary Reports.
- 4.7.7 SMR notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to the IWMDL.
- 4.7.8 The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AK Summary Report is needed.
- 4.7.9 SPM request CCP Management Assessment to review and verify new or revised waste management activities that require revision to IWMDL and/or AK Summary Report.
- 4.7.10 The Host site will not provide any waste container to CCP for characterization until the AKE has received the latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Order, Operator Aids, etc.) used to generate, package, and/or repackage the container.
- [A] The work document(s) provided to the AKE will contain the following information at a minimum:
 - Identification (including revision) of the work document(s) used to generate the container

- Type of activity (e.g., packaging/repackaging only, remediation, treatment)
- Amount (estimated) and type (if known) of liquids
- Type and quantity (estimated) of absorbents used
- Type and quantity (estimated) of neutralization agents used
- Any unexpected conditions or reactions encountered
- General description of waste items
- Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)
- Filter data including model and quantity used
- Parent container identification

4.7.11 The AKE will ensure they have obtained and reviewed the correct version of IWMDL documentation used to generate/manage a container before adding it to the AK Tracking Spread Sheet.

4.7.12 At a minimum of once per calendar quarter, SMR will review the current IWMDL and provide written assurance to the CCP SPM that the list is up to date OR provide necessary documentation to revise the list for waste streams expected to generate additional containers of TRU waste or if containers in the waste stream will be repackaged or remediated. Revision to the Interface Waste Management Documents List can serve to meet the Quarterly SMR Notification requirement.

4.8 Data Validation and Reconciliation

4.8.1 CCP, using CCP-trained Host site personnel where applicable, will provide data generation level validated data packages for all characterization activities. CCP will provide data generation level validated data packages for VE, and radiological characterization, in accordance with the approved CCP procedures governing these processes.

- 4.8.2 Wherever CCP has obtained the services of another CBFO-certified TRU Waste Program, that program will provide data generation level BDRs to CCP in accordance with their own programmatic documents.
- 4.8.3 CCP will provide project level validated data packages for radiological characterization, and VE.
- 4.8.4 The CCP SPM and AKE will perform data reconciliation with applicable data quality objectives (DQOs) in accordance with CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*, and/or the Characterization Reconciliation Report.
- 4.9 Measuring and Test Equipment (M&TE)
 - 4.9.1 CCP operations personnel will provide a list of equipment that requires calibration to the Host site STR/Designee.
 - 4.9.2 CCP is responsible for providing any National Institute Standard Technology traceable or equivalent calibrated M&TE.
 - 4.9.3 The Host site will make available national standard-traceable calibration certificates for gamma and neutron dose measurement instrumentation. Copies of the Certificates of Calibration will be provided to the CCP VPM and CCP M&TE Custodian.
 - 4.9.4 The Host site STR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.
- 4.10 Work Standards
 - 4.10.1 CCP operations personnel will work under the Host site LO/TO procedure.
 - 4.10.2 CCP and Host site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste characterization and certification activities. Host site procedures and work packages will be used for non-waste characterization activities (e.g., equipment repairs).
 - 4.10.3 CCP operations personnel will operate in accordance with CCP-PO-005, *CCP Conduct of Operations*.

- 4.10.4 CCP operations personnel will comply with Host site procedures as they apply to established characterization areas.
- 4.10.5 CCP personnel will work under the Host site safety basis and work control standards, (i.e., General Employee Radiological Training [GERT]). Maintenance work control activities for CCP supplied equipment will be controlled using CCP-TP-140, *CCP Equipment Maintenance*. Maintenance work control activities on Host site-supplied equipment will be controlled using Host site work authorization procedures.
- 4.10.6 As outlined in CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, and CCP-PO-005, it is the responsibility of the CCP VPM to maintain equipment configuration and authorize equipment changes to ensure characterization systems are operated and maintained in accordance with the Host site safety basis. The CCP VPM will not authorize a change to any characterization system until steps 4.10.6[A] and [B] have occurred:
- [A] The CCP Cognizant Engineer has reviewed and approved the proposed change in writing to the CCP VPM (this may be accomplished via e-mail). In addition, any proposed change to any vendor-supplied characterization system must be reviewed and approved by an appropriate vendor engineer or representative. The vendor engineer or authorized representative must provide written approval to the CCP VPM (this may be accomplished via e-mail) for the proposed change.
- [B] The Host site STR/Designee must concur with the proposed change in writing (this may be accomplished by e-mail) and provide a copy of the approved Unreviewed Safety Question (USQ), if it is required.
- 4.10.7 All CCP personnel will provide bioassay samples to the Host site, as required, under the routine/random program established by the Host site. All CCP personnel will submit the bioassay samples required to establish a baseline for activities at the Host site, if applicable.
- 4.10.8 The Host site will analyze bioassay samples provided by CCP personnel within 90 days of collection, if applicable.

- 4.10.9 The CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.
- 4.10.10 Host site radiological controls personnel will perform routine surveys for contamination and radiation as specified in Host site policies or procedures. The CCP SPM or CCP VPM and appropriate Host site management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied buildings or any of the CCP-operated characterization equipment contained in these buildings. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.10.11 The Host site will provide the CCP SPM or CCP VPM with the positive results of continuous or fixed air sample filter analysis within 45 days of removal of the filter from the sampler head, in any monitored area routinely occupied by CCP personnel.
- 4.10.12 The Host site will provide the necessary dosimetry for CCP personnel. Dosimetry reports will be provided to the CCP SPM or CCP VPM.
- 4.10.13 CCP will provide historical information on the operation of any CCP equipment deployed at Host site for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.
- 4.11 Waste Certification and WIPP Waste Information System (WWIS/WDS) Data Entry
 - 4.11.1 CCP will prepare Waste Stream Profile Forms (WSPFs) for the subject Host site waste in accordance with CCP-TP-002.
 - 4.11.2 CCP will transmit characterization and certification data in accordance with WWIS/WDS and CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*, and CCP-TP-530, *RH TRU Waste Certification and WWIS/WDS Entry*.
 - 4.11.3 CCP shall submit copies of WSPFs to the Host site for approval before submittal to CBFO. The Host site will provide written concurrence on the basis of continued compliance with procedures and programs and CBFO certification of the CCP characterization program.

- 4.11.4 The CCP Waste Certification Officials (WCO) will document and certify that all TRU waste payload containers meet the requirements of the WAC and submit the data to the WWIS/WDS for approval.
- 4.11.5 The CCP WCO will provide listings of drums requiring retrieval from storage for the purposes of loading into RH-TRU 72B canisters.
- 4.11.6 CCP will begin their loading and shipping process using payload containers approved in WWIS/WDS.
- 4.12 Transportation
 - 4.12.1 CCP is responsible for meeting all requirements for loading and shipping TRU waste certified by CCP as approved in WWIS/WDS.
 - 4.12.2 CCP will load drums according to CCP WCO listings, using approved procedures, and will provide the CCP WCO with the necessary data to complete the process.
 - 4.12.3 The CCP WCO and Transportation Certification Official (TCO) will work with the Host site as necessary to complete the appropriate transportation activities.
 - 4.12.4 The CCP TCO will work with the Host site as necessary to load the shipping casks.
 - 4.12.5 The CCP TCO will coordinate the completion of the preparations of the cask for shipment in accordance with DOE/CBFO and CCP controlled procedures.
- 4.13 Quality Assurance (QA)
 - 4.13.1 All work performed in the completion of this waste characterization and certification scope will be in compliance with applicable CCP and NWP procedures.
 - 4.13.2 CCP will conduct periodic QA surveillances to assess compliance with applicable CCP Program requirements.
 - 4.13.3 The Host site will conduct audits/surveillances to assess compliance with applicable procedures.

4.14 Procurement

4.14.1 All items and services to be purchased under CCP-PO-001 will be graded by CCP in accordance with CCP-QP-001, *CCP Graded Approach*. The grading will determine whether the items and services are quality-affecting (Quality Level 1 or Quality Level 2) or non quality-affecting (Quality Level 0) for WIPP characterization, certification, and transportation.

- [A] CCP will procure all quality-affecting items and services in accordance with CCP-QP-015, *CCP Procurement*. These items and services are the sole responsibility of CCP with regard to their quality integrity.
- [B] Host site will procure items and services determined by the CCP grading process to be non-quality-affecting for WIPP characterization, certification, and transportation. The Host site will be responsible for verification and compliance for these items and services.
- [C] Items and services that are related to safe operation of the facility, and which do not affect WIPP characterization, certification, and transportation, are not required to be graded by CCP.
- [D] Receipt inspection of quality-affecting items will be performed by personnel trained and qualified in accordance with CCP QA requirements.
- [E] CCP QA will perform receipt inspections of CCP procured items/material and will maintain Source/Receipt Inspection Verification Sheets and associated objective evidence for each shipment in accordance with CCP-QP-026.
- [F] The Host site shall provide support to CCP in the performance of the receipt inspection and material control. The minimum support to be as follows:
 - Provide notification to CCP QA of items/material received.
 - Maintain material in a hold status until inspected and released by CCP QA.
 - Provide suitable staging area or warehouse location to perform inspections.

- Provide personnel, tools, and other resources required to facilitate inspections.
- Provide adequate storage facilities and maintain control of the items/material provided to Host site.

4.15 Project Control

- 4.15.1 CCP and Host site will provide weekly status for their respective scheduled activities.
- 4.15.2 CCP will maintain and provide Host site with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.

4.16 Procedures

- 4.16.1 As defined in CCP-QP-010, editorial or minor changes may be made to all CCP documents except CCP-PO-001; CCP-PO-002, *CCP Transuranic Waste Certification Plan*; CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*; CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*, and CCP-QP-001 without the same level of review and approval as the original document. CCP will process any required changes in accordance with CCP-QP-010.
- 4.16.2 New Technical Operating Procedures (procedures that operate equipment) developed by CCP, scheduled to be used at the Host site, shall be evaluated by the Host site STR/Designee to determine if the procedure shall be added to the Host site review lists defined below.
- 4.16.3 The following documents, and all revisions to these documents, will be provided to the Host site STR/Designee for review:
 - CCP AK Reports
 - CCP Interface Waste Management Documents List
 - CCP AK Assessments
 - CCP Waste Stream Profile Forms

- CCP Health and Safety Plans, as required as per 10 CFR 851
 - CCP-TP-140, *CCP Equipment Maintenance*
 - CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*
 - CCP-TP-504, *CCP Dose-to-Curie Survey Procedure for Remote-Handled Transuranic Waste*
 - CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*
-

NOTE

This note applies to step 4.16.4. Examples of cognizant personnel may include, but is limited to SMEs for the following as applicable to the document reviewed:

- Waste generating/packaging/repackaging processes
 - Chemical and physical characteristics of waste streams
 - Chemical compatibilities
 - Radiological properties of waste streams
 - Treatment permits
 - Nuclear Safety
 - Environmental compliance
 - Facility operations
-

- 4.16.4 Upon receipt of a document listed in step 4.16.3 the SMR/Designee will ensure the document is reviewed by cognizant personnel responsible for the waste management activities relevant to the scope of the document.
- 4.16.5 As warranted, the SMR/Designee will provide written comments to CCP using Document Review Record in accordance with CCP-QP-010.
- 4.16.6 CCP, at its direction, may request objective evidence to support the competency of Host site/generator reviewers.
- 4.16.7 The CCP SPM will confirm that the SMR/Designee written comments are resolved with the Host site STR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

- 4.16.8 The following documents, and all revisions to these documents, will be provided to the Host site STR/Designee as Notify Only for review:
- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
 - CCP-PO-002, *CCP Transuranic Waste Certification Plan*
 - CCP-PO-005, *CCP Conduct of Operations*
 - CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
 - CCP-QP-002, *CCP Training and Qualification Plan*
 - CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
 - CCP-QP-008, *CCP Records Management*
 - CCP-QP-010, *CCP Document Preparation, Approval, and Control*
 - CCP-TP-001, *CCP Project Level Data Validation and Verification*
 - CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*
- 4.16.9 CCP will maintain control of procedures in accordance with CCP-QP-010.
- 4.16.10 The Host site STR/Designee will review or designate the appropriate reviews of the CCP procedures listed in Section 4.16.3 and forward written comments to CCP Document Control in accordance with CCP-QP-010 for resolution.
- 4.16.11 The CCP SPM will confirm that the Host site STR/Designee written comments are resolved with the Host site STR/Designee concurrence prior to proceeding with CCP operations.

4.17 Document Transmittals

- 4.17.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as QA records will be transmitted in accordance with CCP-QP-008.
- 4.17.2 Documents to be provided to the Host site by CCP include, as required:
- [A] List of equipment requiring calibration
 - [B] Copies of NCRs and corrective action documentation as requested
 - [C] Copies of AK Summary Reports
 - [D] Copies of AK source documents and source document summaries, as requested
 - [E] Copies of semi-annual trending summary reports
 - [F] Copies of QA surveillance reports
 - [G] Copies of WSPFs
 - [H] Copies of VE and radiological characterization information and data, as requested
 - [I] Information on chemical usage, sources required, and copies of applicable MSDSs as requested for inventory or reporting reasons
 - [J] Copies of training requirements and associated training records for CCP personnel supporting the Host site, upon request.
 - [K] CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
 - [L] CCP-PO-002, *CCP Transuranic Waste Certification Plan*

[M] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/Department of Environmental Quality/United States Environmental Protection Agency (EPA) or other regulatory audit or compliance/enforcement actions that may impact its ability to characterize and transport TRU waste.

[N] Copy of final data package to WIPP via Waste Information System, as requested.

[O] NMED and EPA approval of the CBFO Certification Audit Report.

[P] Documents called out in Section 4.16.

4.17.3 Documents to be provided to CCP by Host site include:

[A] Documentation of required training

[B] Notification of training completion for CCP for training received from the Host site

[C] Copies of AK source documentation requested by CCP

[D] Radiological dose rate and surface contamination results on waste drums as needed to support WWIS/WDS data entry

[E] Radiological information as described per step 3.2.2[A] of this document

[F] Copies of NCRs, deficiency reports, or other nonconformance documentation per Section 4.3

[G] Copies of the results of Host site assessments pertaining to CCP

[H] Copies of calibration certifications

[I] Copies of QA surveillance reports

[J] Radiological workplace and exposure data including ALARA Planning documents for evaluation of activities.

4.18 Authorization Safety Basis and Configuration Management

- 4.18.1 CCP will coordinate activities with the Host site to ensure site license requirements have been met.
- 4.18.2 The Host site has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the Host site license requirements.
- 4.18.3 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with CCP and Host site procedures that protect the personnel, public, and environment.
- 4.18.4 For CCP-provided equipment, CCP will provide documentation necessary for the Host site to perform the evaluation against the safety analysis. This documentation may include health and safety plans, hazards assessments, system descriptions, equipment drawings, or other information deemed necessary by the Host site.
- 4.18.5 For Host site-provided equipment, CCP will review operational and authorization basis documentation to ensure the safety of CCP personnel while operating equipment.
- 4.18.6 All changes to equipment operated by CCP will be controlled by the Host site work-control program to ensure appropriate authorization basis evaluations are conducted and associated controls are established.
- 4.18.7 The Host site will submit all changes to authorization basis requirements that affect CCP operations for review and concurrence prior to implementation.

5.0 RECORDS

- 5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.
- 5.2 QA records generated by CCP documents referenced in this plan are maintained in accordance with CCP-QP-008.
- 5.3 QA records generated by CCP will be maintained and dispositioned in accordance with CCP-QP-028.
- 5.4 Host site will maintain the following records in accordance with Host site requirements. The list includes, but is not limited to, the following:
 - 5.4.1 MSDSs
 - 5.4.2 Calibration Certifications
 - 5.4.3 Project Control schedules and cost data reports
 - 5.4.4 Radiological records (Exposure records)

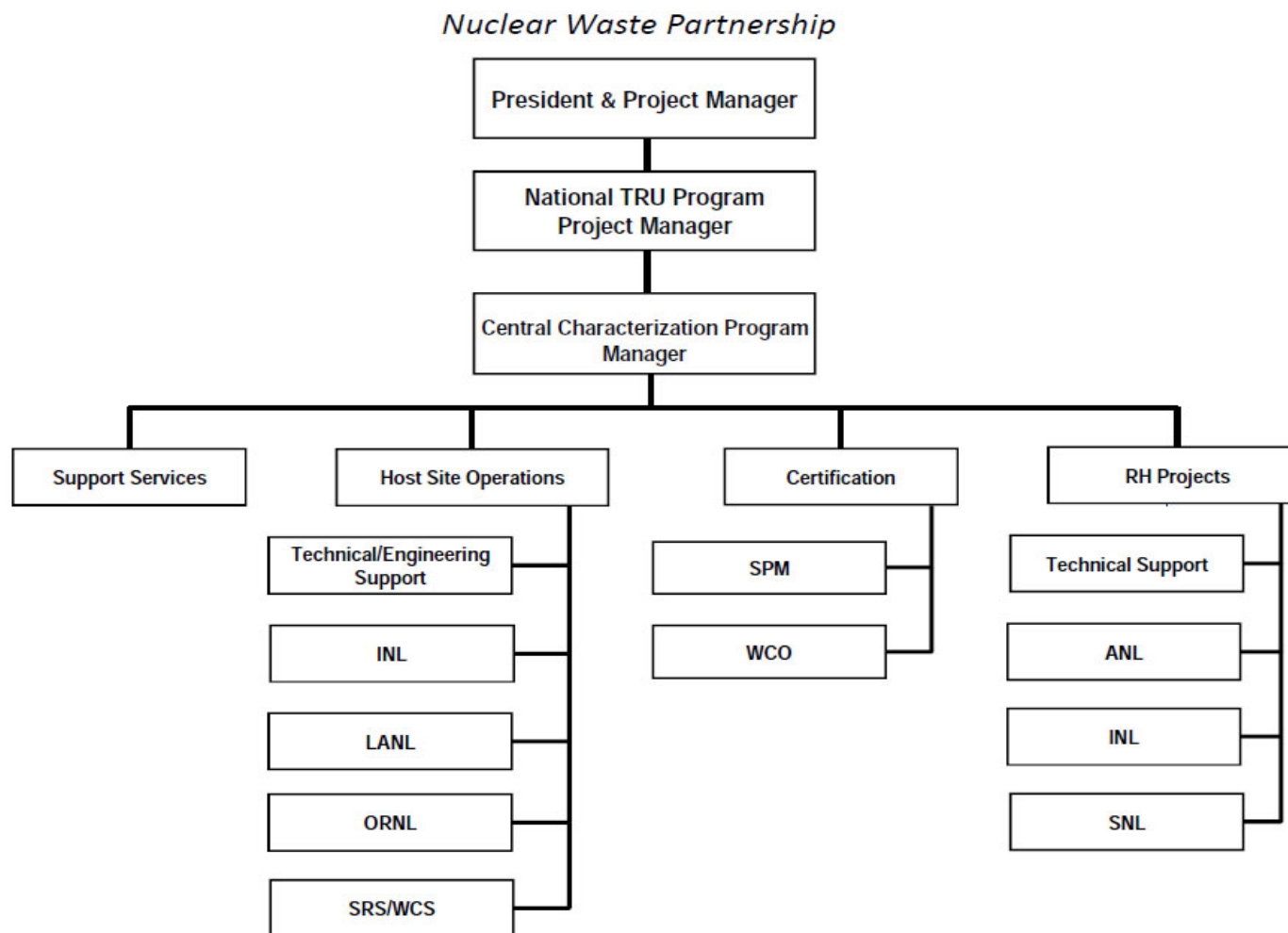
6.0 OVERSIGHT

NOTE

Through the associated SOW, the Host site has delegated the authority to characterize, certify, and ship TRU waste to the WIPP or to INL. Nonetheless, the Host site retains the responsibility for proper disposal as the waste generator. Accordingly, the following actions will define the level of oversight of the CCP by Host site personnel.

- 6.1 The Host site will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the Host site is fully compliant with waste disposal requirements as set forth in the WCCIP, WAC, and WAP. However, the Host site may conduct, at their discretion, periodic surveillances of CCP operations.
- 6.2 Following successful completion of the certification audit, the Host site QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with the Host site QA procedures.
- 6.3 The Host site QA will provide copies of its surveillance reports to the CCP PM and CCP SPM. CCP QA and the SPM will take the following actions:
 - 6.3.1 Review the Host site surveillance reports for any finding or other deficiencies against the CCP SOW.
 - 6.3.2 Provide Host site QA with CCP actions to correct the identified deficiencies.
 - 6.3.3 CCP QA will maintain an information file of the Host site surveillance reports conducted on the CCP SOW.

Figure 1. Nuclear Waste Partnership – RH



CCP-PO-004

Revision 40

CCP/SRS Interface Document

EFFECTIVE DATE: 06/14/2021

Daniel Wade

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
8	02/08/2002	Made editorial changes and other clarification to 2.0, 3.2.1, 3.38, 4.3.1, 4.4.2 H-P, 4.15 through 4.15.7 also updated Figure 1 & 2. Complete rewrite of 4.10 Transportation.
9	05/09/2002	This document is being revised to correct errors and update the work chart in Figure 1 and 2; Three additional procedures were added to 4.13.3 for the STR to review; Incorporated changes requested by Programs Industrial Safety and Hygiene Document Review to 3.5.6; Incorporated additional comments and changes to section 4.11.1, 4.11.2, and 4.13; Added additional procedure to 4.13.6
10	06/27/2002	Made changes to 3.2.1, 3.5.3 and 4.6.2, Updated Figure 2
11	09/20/2002	Clarification to sections 1.1, 1.2, 3.2, 4.2, 4.3, 4.5, 4.6 and 4.13; Added additional procedures to 4.13.3 and 4.13.6 for the STR and the FSR review; Added steps 3.2.9, 3.3.10, 3.5.7, and 4.6.3.
12	04/08/2003	Revised Steps 3.2.1, step 4.7.2.[E] and step 4.1.3 rewrote Section 4.10, Transportation, added new procedures to the lists in Steps 4.13.3 and 4.13.6, and deleted CCP-TP-057 from Step 4.13.3 since that procedure has been cancelled.
13	08/04/2003	Revision to incorporate corrective actions for CAR-SRS-0004-03 for modification of drums; adding VE to be performed under CCP and to incorporate changes in response to SRS QA Audit Report 2003-AR-26-0006.
14	10/09/2003	Revision to incorporate changes to referenced documents and to add VE as an activity conducted under CCP program.
15	05/24/2004	Revised steps 3.2.1, 4.2.3, 4.3.1[C], 4.5.1[A], and [C], 4.10.1, 4.12.1, 4.13.3, and Figures 1 and 2.
16	09/20/2004	Clarified FGE reporting in Section 3.5.3 and 3.5.4; Clarification to Section 4.11.2 and 4.6.2; and editorial changes. Updates to Figures 1 and 2 in response to audit observation I04-10-O-03.
17	10/27/2004	Revised step 4.1.1 and 4.1.1[A] during SRS recertification audit.
18	02/09/2005	Revised based on the Implementation Plan for CCP Characterization Operations Improvements.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
19	03/14/2005	SRS request to reflect facility restrictions within the interface document.
20	11/02/2005	Revised steps 4.13.3 and 4.13.4 to be consistent with step 4.9.1 during CCP SRS Recertification Audit A-06-02.
21	03/31/2006	Revised to formalize process for safety basis interactions with new Section 4.16, Authorization Basis (AB) and Configuration Management. Added new Section 4.17, Procurement and clarified Subcontract Technical Representative (STR)/Facility Safety Representative (FSR) review on documents.
22	11/16/2006	The SRS notification threshold limit for PECi was revised to support a request by SRS. Revised to implement the Waste Isolation Pilot Plant Hazardous Waste Facility Permit requirements resulting from the Section 311/Remote-Handled (RH) Permit Modification Request (PMR).
23	01/31/2007	Revised to clarify Authorization Basis and Configuration Management requirements.
24	06/28/2007	Revised for the addition of Remote Handled Waste shipments. Also, added references to the host site notification procedure for characterization results that meet site safety basis notification limits.
25	05/20/2008	Revised to correspond to changes to the Statement of Work 1E8863, Revision 7, <i>Characterization of SRS TRU Waste</i> , incorporated editorial changes, updated the Subcontract Technical Representative (STR) review and concurrence procedure list, and incorporated Remote-Handled (RH) Dose-To-Curie (DTC) Characterization.
26	08/26/2008	Added Headspace Gas Summa [®] sampling and analysis procedures to facilitate sampling at Savannah River Site (SRS).
27	05/22/2009	Per CAR-SRS-0002-09, revised to redefine transportation roles and responsibilities, delineate a process for feedback from Savannah River Site (SRS) to Central Characterization Project (CCP) for procedural discrepancies, and add additional measuring and test equipment (M&TE) requirement.
28	12/29/2010	Minor revision to update references to the <i>Waste Isolation Pilot Plant Hazardous Waste Facility Permit</i> .

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
29	07/05/2011	Revised to generalize the description of contact-handled (CH) Transportation Containers to allow use of TRUPACT-III. Added gas generation testing (GGT) procedures.
30	10/17/2011	Clarification to Sections 3.1.1, 3.3.5, 3.8.5, 4.1.2, 4.1.4, 4.11.1, 4.19.2, and 4.19.4. Removed procedure CCP-TP-508, <i>CCP RH Standard Real-Time Radiography Inspection Procedure</i> , from 4.16.5 and 4.16.7; and other editorial changes.
31	10/01/2012	Revised to incorporate Nuclear Waste Partnership (NWP) transition changes.
32	10/25/2012	In response to CAR-LANL-0003-12, revised to clarify roles associated with providing measuring and testing equipment (M&TE) Certificates of Calibration to Central Characterization Program (CCP).
33	06/19/2013	Revised to implement the Permit Modification Request Class 2 approved by New Mexico Environment Department (NMED) dated March 13, 2013.
34	08/29/2013	Revised to add NP 13-1, <i>Nuclear Waste Partnership LLC Quality Assurance Program Description</i> to reference page and any references to gas generation testing (GGT) procedures.
35	10/08/2014	Revised to provide the allowance to use either CCP-TP-035, <i>CCP Container Management</i> , or CCP-TP-068, <i>CCP Standardized Container Management</i> , for container management and removed CCP-QP-029, <i>CCP Corrective Action Management</i> and replaced with WP-15-GM1002, <i>Issues Management Processing WIPP Forms</i> .
36	02/17/2016	Revised format and content to better align with a standardized Central Characterization Program (CCP) interface document format and to address enhancements pertaining to the Acceptable Knowledge (AK) process.
37	01/30/2017	Clarified Interface Waste Management Document List (IWMDL) quarterly review responsibilities in step 4.14 [O] and deleted CCP-CM-001 notify only in step 4.21.6.

RECORD OF REVISION (Continued)

Revision Number	Date Approved	Description of Revision
38	06/29/2017	Revised to add clarification on Transportation Certification Official (TCO) and Mobile Loading team lead to address questions from Readiness Assessment at Savannah River Site (SRS) for loading. Update the Organizational chart and editorial corrections and clarifications through the document.
39	04/17/2020	Revised to incorporate changes at Savannah River Site (SRS) and Central Characterization Program (CCP) throughout document for enhanced acceptable knowledge (AK) documentation process, new characterization equipment and operations, and SRS reference documents.
40	06/14/2021	Added responsibilities and interface requirements regarding characterization of waste containers from SRS K-Area Complex. Document lists are updated in several sections. Clarifications and editorial changes are made throughout the document. Revised personnel notification for consistency. Also, updated title of WP 15-GM1002, <i>Issues Management Processing of WIPP Forms to Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.

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1.0 PURPOSE

This document establishes the interfaces between the Central Characterization Program (CCP) and the Savannah River Site (SRS). This interface Document is subordinate to upper-tier agreements that define the work scope to be executed. The CCP is managed by Nuclear Waste Partnership (NWP) National TRU Program (NTP) at the direction of the U.S. Department of Energy (DOE) Carlsbad Field Office (CBFO).

It is not intended to be used in lieu of a task-specific subcontract. Specifically, this document identifies CCP and SRS/generator responsibilities for implementing requirements and deliverables.

1.1 Background

The SRS is a transuranic (TRU) waste generator site in the DOE complex. The Solid Waste Management (SWM) department is the centralized facility at SRS for processing, characterization and shipping TRU waste for disposal. The DOE Savannah River Office (SRO) manages all activities at the SRS, including waste management, for the DOE.

The DOE CBFO has deployed the CCP to the SRS to characterize, certify, and ship contact-handled (CH) and remote-handled (RH) TRU waste for disposal at the Waste Isolation Pilot Plant (WIPP). CBFO has audited and certified CCP to perform these activities at the SRS.

1.2 Scope

This document applies to the CCP, the SRS, and generators whose waste is characterized, certified, and shipped by CCP for the SRS. "Generator" may refer to the SWM or it may refer to the facility that originally generated and/or treated and packaged the waste. This document addresses CCP and SRS/generator responsibilities associated with TRU waste management including interface requirements for the following areas:

- Facilities, processes, and equipment for TRU waste characterization and shipping
- Safety Programs
- Training and qualifications
- Container Management
- Deficiencies and nonconformances

- Nondestructive examination (NDE) including visual examination (VE) and real-time radiography (RTR)
- Radiological Characterization (RC) including nondestructive assay (NDA), dose-to-curie (DTC) and sampling and analysis
- Chemical Sampling Analysis
- Flammable Gas Analysis (FGA) for transportation requirements
- Performance Demonstration Program (PDP)
- Source control
- Acceptable Knowledge (AK)
- Data validation and reconciliation
- Measuring and Test Equipment (M&TE)
- Work Standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- TRU Waste Certification and WIPP Waste Information System/Waste Data System (WWIS/WDS) data entry
- Payload assembly and loading
- Transportation
- Configuration Management
- Safeguards and Security (S&S)
- Nuclear Material Control and Accountability (NMC&A)

These services will be performed with CCP and/or SRS facilities, processes, and equipment with appropriate DOE/CBFO-certified procedures. The SRS may augment CCP efforts as requested. Augmented services provided by the SRS shall comply with applicable CCP procedures.

The CCP scope of work is accomplished by individuals from multiple organizations; personnel are trained and qualified under the CCP program, regardless of their actual employer.

The SRS/generator services covered by this document include programs for Radiological Controls, Occupational Safety and Health, Industrial Hygiene, Nuclear Safety/Authorization Basis (AB), Emergency Management and Environment/Hazardous Waste Management.

SRS maintains ownership of the waste and the responsibility for its disposal. This responsibility includes additional chemical sampling and analysis deemed necessary by the WIPP Co-Permittees. SRS will also be responsible for reporting conditions or concerns that have or may have safety, health, QA, security, operational, or environmental implications.

For SRS K-Area Complex (KAC), the CCP characterization data are also used to demonstrate compliance with SRS S&S and NMC&A requirements related to Criticality Control Overpacks (CCOs). CCP data are generated in compliance with specified SRS requirements to ensure SRS staff can use this data for these applications.

1.3 Site information

SRS is located in South Carolina. The U.S. Environmental Protection Agency (EPA) Facility Number is SC1890008989.

2.0 REQUIREMENTS

All services provided by CCP will comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC), the *Waste Isolation Pilot Plant Hazardous Waste Facility Permit, Waste Analysis Plan* (WIPP-WAP), DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan* (WCPIP) and Certificates of Compliance (COCs) for Type B Packages issued by the Nuclear Regulatory Commission (NRC). DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document* (QAPD).

Requirement from these upper-tier documents flow down to the following program documents:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-026, *CCP Configuration Management*
- CCP-PO-050, *CCP TRUPACT-III TRU Waste Authorized Methods For Payload Control (CCP TRUPACT-III TRAMPAC)*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*
- DOE/WIPP 02-3183, *CH Packaging Program Guidance*
- DOE/WIPP-02-3283, *RH Packaging Program Guidance*
- DOE/WIPP-06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*
- DOE/WIPP-17-3589, *Basis of Knowledge for Evaluating Oxidizing Chemicals in TRU Waste*
- WP 13-1, *Nuclear Waste Partnership LLC Quality Assurance Program Description*
- SRNS 5Q Radiological Control Manual

- SRNS 7Q Security Manual
- SRNS 8Q Employee Safety Manual

A more comprehensive list of documents included in the CCP System of Controls is provided in the Procedure section and Attachment 1 of this document.

3.0 RESPONSIBILITIES

CCP has primary responsibility for performing TRU waste characterization, certification, and shipping activities in accordance with governing requirements described herein. CCP services include compilation, reporting, and confirmation of AK, NDE, radiological characterization, radiological control, FGA for transportation, WWIS/WDS data entry, and transportation activities.

The SRS Management and Operating (M&O) Contractors' responsibilities are limited to the CCP activities described herein being performed on their behalf and for performing TRU waste management activities in accordance with SRS/generator documents provided to CCP.

3.1 Operations

3.1.1 CCP performs the following operation activities:

- [A] Performs system start-up and calibration of characterization equipment.
- [B] Operates CCP or SRS facilities, process, and equipment in accordance with approved procedures including CCP-PO-005, *CCP Conduct of Operations*.
- [C] Performs safety walk-downs prior to operations.
- [D] Responds to and resolves assessment and surveillance findings for CCP activities.
- [E] Ensures CCP and SRS personnel are trained and qualified in accordance with requirements specified in the Training and Qualification section of this document.
- [F] Demonstrates CCP operations during DOE/CBFO certification/recertification audits and EPA inspections.
- [G] Performs Management Assessments on: 1) CCP Operations and 2) SRS waste management activities referenced in active CCP AK Summaries/Waste Stream Profiles.
- [H] Performs inspection of containers provided by the SRS to ensure they are safe and ready for CCP activities.

3.2 SRS Responsibilities:

- [A] Radiological controls as needed to support characterization and shipping activities, including:
- Radiological postings.
 - Radiation protection surveys, both initial and routine, on characterization equipment and provide an approved survey report to the CCP Vendor Project Manager (VPM).
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source checked survey instrumentation.
 - Radiological Work Permits (RWP) to support CCP activities.
 - Bioassay sample collection, evaluation, and reporting, in accordance with 10 CFR 835.402, *Individual Monitoring*, if applicable. The CCP SRS Project Manager (PM) or CCP VPM will be notified of any positive bioassay results as soon as is reasonably possible.
 - Radiological source controls.
- [B] Provides adequate facilities for the safe performance of characterization and shipping activities.
- [C] Provides site-specific training, as needed, to ensure safe operations.
- [D] Provides Industrial Safety and Health (IS&H) support.
- [E] Provides Fire Protection and Emergency Management support.
- [F] Provides AB oversight, including Unreviewed Safety Question (USQ) evaluations.
- [G] Provides environmental impact oversight and support.
- [H] Provides on-site container transportation.

- [I] Provides container handling, inventory control, and storage location tracking.
- [J] Provides personnel to be trained and qualified under the CCP program as needed to support CCP activities such as NDE, RC, etc., if applicable.
- [K] Coordinates and obtains document classification reviews as required to allow the public release of documents such as the AK Source Documents, AK Summary Reports (AKSRs), Chemical Compatibility Evaluations (CCEs), AK Assessments (AKAs), Basis of Knowledge Evaluations/Exemptions (BOKs), etc.
- [L] Provides calibrated M&TE for use in CCP activities or obtains calibrated service for CCP provided M&TE.
- [M] Provides calibration standards and working standards, including relevant documentation (certification of plutonium content, isotopics, and any interfering impurities), for use with KAC NDA equipment (e.g., system quality control, calibration, bias control)
- [N] Provides isotopic distribution data on a container basis for use during characterization.
- [O] Provides waste packaging materials and other equipment/materials purchased and inspected in accordance with the Qualified Supplier List (QSL) approved program.
- [P] Provides hazardous waste manifesting, bill of lading, and notifications for transportation.
- [Q] Provides qualified personnel to support maintenance of CCP equipment.
- [R] Responds to and resolves CCP management assessment and CCP QA surveillance findings related to SRS waste management activities.

3.3 CCP SRS Project Manager (PM)

- 3.3.1 Functions as CCP's primary interface and point-of-contact (POC) between CCP and the Site Management Representative (SMR)/Designee for waste CCP activities.
- 3.3.2 Unless otherwise assigned herein, ensures documents listed in step 4.22.4 are provided to the SRS.

- 3.3.3 Ensures sufficient CCP equipment and personnel are available to perform the required CCP activities at the SRS.
- 3.3.4 Provides status on CCP operations to the SMR/Designee, as requested.
- 3.3.5 Works in conjunction with SMR/Designee to establish and maintain reasonable and appropriate throughput of waste containers.
- 3.3.6 Ensures CCP management and CBFO are informed of safety, compliance, or production issues impacting CCP SRS activities.
- 3.3.7 Ensures the CCP Management Assessment program is implemented for CCP Operations and SRS waste management activities related to active CCP AK Summaries/Waste Stream Profiles.
- 3.3.8 Work with the SMR to schedule and ensure access to areas to perform visual observations of selected waste streams.
- 3.4 CCP Site Project Manager (SPM)
 - 3.4.1 Functions as CCP's primary interface and POC between CCP and the SMR/Designee for all waste certification activities.
 - 3.4.2 WIPP Waste Acceptance Criteria (WAC) and Waste Analysis Plan (WAP) subject matter expert (SME) and compliance authority.
 - 3.4.3 Ensures AKSRs, CCEs, AKAs, BOKs, and other documents for TRU waste characterized by the CCP are prepared, approved, issued, and provided to the SMR/Designee.
 - 3.4.4 Ensures Waste Stream Profile Forms (WSPFs) are reviewed and approved.
 - 3.4.5 Ensures that project level verification and validation of batch data reports (BDRs) are completed.
 - 3.4.6 Provides evidence to the SMR/Designee of PDP participation and successful completion.
 - 3.4.7 Ensures software used by CCP for characterization at SRS is controlled in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*.

- 3.4.8 Provides AKE periodic notifications that the Interface Waste Management Document Lists (IWMDLs) are current, as necessary.
- 3.4.9 Coordinate presentation of AK briefings to CCP characterization personnel, generator site SMR, POCs/SMEs or Cognizant Designees directly involved with the generation of each waste stream.
- 3.4.10 Perform or delegate visual observations for waste streams actively being generated and/or repackaged by the Host site in accordance with CCP-PO-045, *CCP Waste Management Field Observation*.
- 3.5 Acceptable Knowledge Expert (AKE)
 - 3.5.1 Collects, compiles, reviews, and documents AK in accordance with CCP-TP-005, *CCP Acceptable Knowledge Documentation*.
 - 3.5.2 Ensures CCP has obtained necessary container information prior to characterization.
 - 3.5.3 Prepares and maintains the IWMDL for each waste stream, including the identification of the applicable procedure POCs/SMEs involved directly with the generation of each waste stream (identified by the SMR), as necessary.
 - 3.5.4 Performs CCEs.
 - 3.5.5 Performs AKAs for each waste stream, and documents the AKA in an Assessment Memorandum to the Site Project Manager (SPM).
 - 3.5.6 Performs BOKs evaluations or documents BOK exemptions.
 - 3.5.7 Submit IWMDL and associated SMR notifications to SPM to submit to records.
 - 3.5.8 Works with cognizant Host site/generator personnel to resolve comments and questions.

3.6 NWP Quality Assurance (QA) Engineer

- 3.6.1 Functions as NWP's primary interface and POC for QA matters between CCP, SRS, DOE/SRS, and DOE/CBFO.
- 3.6.2 Validates the Nonconformance Reports (NCRs) generated by CCP personnel performing CCP activities at the SRS.
- 3.6.3 Provides copies of NCRs for information to the SRS SMR/Designee as requested.
- 3.6.4 Ensures that NCRs are dispositioned in a timely manner in accordance with CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*.
- 3.6.5 Provides assistance in generation, disposition, and closure of NCRs and Issue Notices as requested.
- 3.6.6 Ensures performance of receipt inspection in accordance with CCP-QP-026, *CCP Inspection Control*, for items and services procured by NWP.
- 3.6.7 Provides the SMR/Designee with a copy of the semi-annual trending summary reports in accordance with CCP-QP-019, *CCP Quality Assurance Reporting to Management*.
- 3.6.8 Conducts periodic QA surveillance to assess compliance with applicable WIPP requirements.

3.7 SRS Site Management Representative (SMR) (SRS Management Position)

- 3.7.1 Functions as the SRS primary interface and POC between the SRS and CCP.
- 3.7.2 Ensures cognizant SRS and generator POCs/SMEs are identified and available as necessary to support the review of CCP documents.
- 3.7.3 Coordinates review, provides comments, and approves comment resolutions on applicable CCP documents. This includes facilitating generator document review and comment resolution as necessary. The review and comment resolution will be documented in accordance with CCP-QP-010, *CCP Document Preparation, Approval, and Control*.

- 3.7.4 Facilitates workflow between CCP and SRS TRU waste generators as necessary to allow CCP to fulfill program requirements. This includes CCP access to generator processes and documentation as necessary.
- 3.7.5 Ensures unreviewed safety question determination (USQDs) needed for proposed modifications to CCP hardware, software, or procedures are prepared and approved by qualified SRS personnel prior to CCP implementing the proposed modification.
- 3.7.6 Ensures CCP is provided appropriate facilities, processes, equipment, construction services, utilities, phone services, network services and office services necessary to perform their activities at the SRS.
- 3.7.7 Notifies the CCP PM and VPM of any Safety Basis, S&S, and/or NMC&A changes to action levels that will impact CCP initiated notifications.
- 3.7.8 Performs reviews of the IWMDL and notifies SPM that the list is complete and includes the most current revision of the relevant procedures, as necessary.
- 3.7.9 Ensures CCP personnel have access to facilities to observe operations and interview personnel associated with generation, packaging, repackaging, or treatment of TRU waste.
- 3.7.10 Ensures site support (e.g., Radiological, IS&H, waste handling, etc.) is available for CCP activities.
- 3.7.11 Ensures documentation of completed SRS-specific training is delivered to CCP Training.
- 3.7.12 Provides local personnel to support CCP characterization operations such as VE.
- 3.7.13 Provides personnel to support the CCP Acceptable Knowledge Experts (AKE) in the collection of documents.
- 3.7.14 Works in conjunction with the CCP PM and VPM to maintain reasonable and appropriate throughput of waste containers.
- 3.7.15 Ensures that periodic QA surveillances of CCP operations by the SRS are conducted and reported to CCP.

- 3.7.16 Provides documented information on containers that have been modified since the original container closure and/or AK has been completed for the containers (e.g., remediation of containers or venting).
- 3.7.17 Provides adequate record storage facilities and access to the records for the CCP AK source documents.
- 3.7.18 Provides personnel to support loading and shipping activities.
- 3.7.19 Ensures CCP VPM receives quarterly dosimetry and bioassay results on radiation worker-trained CCP personnel.
- 3.7.20 Ensures the provisions of SRS 5Q, *Radiological Control Manual*, are implemented and compliance is maintained.
- 3.7.21 Ensures that the SRS AB represents the CCP activities and equipment correctly.
- 3.7.22 Will provide approval to changes of documents listed in Section 4.22.4.
- 3.8 SRS First Line Managers
 - 3.8.1 Confirms waste containers are appropriately staged for the CCP processes.
- 3.9 CCP Vendor Project Manager (VPM)
 - 3.9.1 Obtains SRS management daily release/approval prior to performing CCP operations.
 - 3.9.2 Ensures CCP and SRS personnel are qualified per the List of Qualified Individuals (LOQI) at the beginning of each shift so that only qualified personnel perform waste characterization activities or field operations.
 - 3.9.3 Works in conjunction with CCP PM and SRS SMR/Designee to maintain reasonable and appropriate throughput of waste containers.
 - 3.9.4 Provides daily pre-operations briefing to CCP personnel. The daily pre-operations briefing may be combined with the SRS pre-operations briefing as agreed between the CCP SRS PM and SRS operations management.

- 3.9.5 Ensures applicable manufacturers Material Safety Data Sheets (MSDSs)/Safety Data Sheets (SDSs) for products brought to the facility by the CCP are provided, maintained, and available to support operations and meet the requirements of the SRS chemicals management program.
- 3.9.6 Provides oversight of CCP field operations to ensure safe, compliant and efficient operations.
- 3.9.7 Notifies the CCP SRS PM and the SMR/Operations Manager of any abnormal events associated with safe and compliant operation of CCP characterization activities for reporting purposes.
- 3.9.8 Ensures CCP notifications required to comply with the SRS Safety Basis, S&S, and/or NMC&A are incorporated into appropriate CCP work documents and appropriate CCP personnel (including offsite personnel such as Independent Technical Reviewers [ITRs], NDA Expert Analyst [EA], and SPMs) are aware of their responsibility to make such notifications.
- 3.9.9 Obtains SMR review and concurrence prior to issuance/approval of CCP Operator Aids or Standing Orders that could affect changes to equipment operation or configuration.
- 3.9.10 Attends daily SRS Shift Turnover meeting where safety issues and activities for the day are discussed, facility status is reviewed, and radiological changes are identified.
- 3.9.11 Reviews SRS quarterly dosimetry and bioassay results on radiation worker-trained CCP personnel and ensures the applicable results are provided to the individual CCP employee.
- 3.9.12 Ensures CCP personnel comply with SRS integrated work management, environmental, safety, and security requirements. See Attachment 1.
- 3.9.13 Controls access of CCP personnel including its subcontractors to the field. Requests site access for visitors.
- 3.9.14 Functions as CCP's primary interface and POC between CCP and SRS for field operations.
- 3.9.15 Works with CCP Configuration Management group to ensure that CCP-provided equipment is maintained under a CCP-approved Configuration Management Program.

- 3.9.16 Ensures that new additions to and/or modifications made to CCP-provided facilities and/or equipment are submitted to the SMR as soon as practicable and approvals are received prior to implementation.
- 3.10 CCP Waste Certification Official (WCO)
 - 3.10.1 Obtains approved WSPF for containers to be certified.
 - 3.10.2 Documents and certifies all TRU waste payload containers meet the requirements of the WAC, TRUPACT-II Authorized Method for Payload Control (TRAMPAC), TRUPACT-III TRAMPAC, HALFPACT TRAMPAC, RH TRAMPAC, and submits the data to the WWIS/WDS for approval.
- 3.11 NTP Transportation Certification Official (TCO)
 - 3.11.1 Ensures NTP Transportation personnel are trained and qualified to perform WIPP-compliant CH and RH TRU waste packaging and loading operations at the Host site prior to starting work activities and are listed on the current LOQI.
 - 3.11.2 Provides oversight to NTP Transportation personnel for payload and Overpack assembly and loading.
 - 3.11.3 Builds payloads from certified containers and Overpacks provided by Waste Certification Officials (WCOs) in WWIS/WDS.
 - 3.11.4 Certifies payloads for transportation to and disposal at WIPP.
 - 3.11.5 Builds shipments from approved payloads in WWIS/WDS.

4.0 INTERFACE

4.1 Initial Setup for Operations

4.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and procedures to the Host site SMR/Designee, who will coordinate facility, QA, and Environmental Safety and Health (ES&H) reviews to determine satisfactory compliance with SRS Safety Basis requirements, radiological controls requirements, and other safety and operations requirements.
- [B] Completing readiness activities as needed to support authorization of CCP activities at the SRS.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures and processes.
- [D] Mobilizing of project staff and equipment.

4.1.2 The SRS is responsible for the following during initial setup:

- [A] Providing office space for CCP personnel and locations and utilities for CCP equipment.
- [B] Reviewing and approving work packages for CCP equipment setup.
- [C] Providing CCP personnel with computer access, badging, and Host site required training and reading.
- [D] Defining and coordinating readiness activities as needed to support authorization of CCP activities at the Host site.

4.2 Training and Qualification

4.2.1 CCP personnel or SRS personnel who perform work under CCP procedures will be trained and qualified to WIPP requirements in accordance with CCP-QP-002, *CCP Training and Qualification Plan*.

- 4.2.2 CCP and SRS personnel assigned to the field operations must complete the SRS-specific training. The SMR will ensure the SRS-specific training requirements are sent to CCP Training and notification is made to the Vendor Project Manager (VPM).
 - 4.2.3 Both the CCP training and SRS-specific training must be complete prior to the individual being assigned to perform independent work at the SRS.
 - 4.2.4 Administrative work, such as BDR reviews requiring no access to characterization activities or field operations at the SRS, may be completed by personnel who have not completed the required SRS-specific training. Personnel who have not completed SRS-specific training will not be allowed unescorted access to the characterization activities or field operations.
 - 4.2.5 A LOQI will be monitored by the CCP VPM to confirm CCP and SRS personnel assigned to perform work are qualified.
 - 4.2.6 The SRS will schedule and provide forms for individuals that are required to take a physical, as necessary.
- 4.3 Routine Operations
- 4.3.1 General Conditions of Operation
 - [A] The SRS has the overall responsibility for the management of the nuclear materials and operations of the nuclear facilities.
 - [B] Work performed by CCP personnel (including subcontractors) will be in compliance with SRS and CCP requirements. See Attachment 1.
 - [C] CCP personnel will STOP WORK (or Pause), as appropriate and will notify SRS Shift Operations Manager (SOM) and the CCP VPM in the event of a safety concern (e.g., Technical Safety Requirement [TSR] violation, PAAA violation, breached container, emergency, injury, potential compliance violation) or security concern (e.g., S&S or NMC&A issue).
 - [D] CCP personnel will follow CCP-PO-005, *CCP Conduct of Operations*, for reporting employee concerns or abnormal conditions.

- [E] Authorization Basis (AB) and Configuration Management
 - [E.1] The SRS has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved SRS Documented Safety Analysis (DSA).
 - [E.2] The SRS shall provide to CCP, SRS generated AB documentation concerning CCP related activities and equipment, including USQDs, for CCP's review.
 - [E.3] CCP has primary responsibility to control operations and CCP-provided equipment configurations to ensure compliance with CCP and SRS procedures that protect the personnel, the public, and the environment.
 - [E.4] For CCP provided equipment, CCP will provide the documentation necessary for the SRS to perform the evaluation against its safety analysis. This documentation may include HSPs, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and the SRS.
 - [E.5] For SRS-provided equipment, CCP will review operational and AB documentation, including USQDs, prior to assuming operation of the equipment to ensure the protection of personnel, the public, and the environment.
 - [E.6] All changes to equipment operated by CCP will be controlled by the SRS Work Control Program to ensure appropriate AB evaluations are conducted, and associated controls established.
 - [E.7] The SRS will submit all changes to AB requirements that affect CCP operations to CCP prior to implementation.

4.3.2 CCP personnel will work under the SRS requirements for hazardous energy control.

4.3.3 CCP personnel will perform work in accordance with CCP and DOE-CBFO procedures for characterization, certification, and shipping activities and SRS-approved work packages and procedures for non-waste activities (e.g., equipment repairs). Both CCP and DOE-CBFO processes will comply with SRS requirements.

4.4 Employee Monitoring

4.4.1 CCP personnel will participate in the SRS Bioassay program and will submit bioassay samples if required by the SRS Radiation Protection Program to establish a baseline for activities at the SRS.

4.4.2 CCP personnel will participate in the SRS radiological monitoring program as required by the radiological work permit process governing work performed.

4.4.3 The CCP SRS PM or CCP VPM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred or if CCP personnel are required to resubmit bioassay samples as soon as is reasonably possible.

4.5 Filter Inspection/Filter Changeout

4.5.1 SRS/CCP personnel will inspect the filters on containers as part of the container acceptance and will document whether the filter is a WIPP-approved filter. This information will be transmitted to the CCP VPM.

4.5.2 Filter changes performed on containers that do not require repackaging will be documented and the information transmitted to the CCP VPM.

4.5.3 SRS/CCP personnel also inspect and verify filter models on containers as part of the FGA sampling process.

4.6 Container Management

4.6.1 The SRS provides container movement and storage compliant with the DSA.

4.6.2 The SRS provides the dose rate and surface contamination information necessary to certify TRU waste containers for disposal.

- 4.6.3 The SRS ensures waste containers have a unique site identification number assigned.
- 4.6.4 The SRS is responsible for providing documented information to the SPM on any modification to the container after original container closure and/or AK has been completed.
- 4.6.5 The SPM will review the documented information of modified containers and will notify the SMR when the containers are approved for entrance into the CCP characterization process.
- 4.6.6 CCP performs container management throughout the CCP characterization process in accordance with CCP-TP-068, *CCP Standardized Container Management*, and CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*.
- 4.6.7 The SRS will notify CCP when any container configuration is changed externally or internally.
- 4.6.8 If a nonconformance is identified with a container, during the characterization or certification process, the container will be controlled in accordance with CCP-QP-005.
- 4.6.9 CCP AK personnel will maintain a list of characterization-eligible containers from each waste stream identified. When repackaging or VE of a waste container is required, the following container identification (ID) scheme will be followed as applicable.
- [A] When the waste from one TRU input container results in one TRU output container, the container ID from the Input container is to be used with the addition of an "A" suffix as the ID number on the output container (e.g., input container is SR10C0057, the output container will be labeled as SR10C0057A). This scheme is also to be applied to re-label waste containers that do not require repackaging or VE.
- [B] For non-CCO containers, when the waste from one TRU input container results in the creation of two or more TRU output containers, a standard convention of adding a sequential single or, if required, double letter suffix to the input container's ID number is used to label the TRU output containers produced (e.g., input container is SR10C0057, the first output container is SR10C0057A, and the second output container is SR10C0057B).

- [C] For CCOs, when waste from one TRU input container results in the creation of two or more TRU output containers, new containers will use the existing CCO nomenclature protocol (e.g., KDByyxxxxx). If waste remains in the initial TRU input container, this CCO will retain its original container ID number.
- [D] When the waste from two or more TRU input containers from the same waste stream are combined into one output container, the container ID number from the first input container is used with the addition of an "A" suffix as the ID number on the TRU output container (e.g., SR10C0057 and SR10C0059 are combined into one output container. SR10C0059 was the first drum repackaged. The output container is SR10C0059A).
- [E] When prohibited items are segregated and placed into a separate output container from the bulk of the waste, a new container ID is applied to the segregated waste container. Prohibited items from more than one input waste container may be placed into the segregated waste container provided the input containers are from the same waste stream.
- [F] CCP AK personnel are to be notified as soon as is practical of waste container ID number changes resulting from the actions in steps 4.6.9 [A] through [D].

4.7 Deficiencies and Nonconformances

4.7.1 CCP Identified Deficiencies and Nonconformances

NOTE

The NWP QA Engineer will confirm appropriate closure of the NCR.

- [A] If personnel identify a nonconforming condition associated with a waste container during CCP activities, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] If the deficiency or nonconformance is an issue that will be resolved by CCP, CCP will provide notification (e.g., verbal, or email as requested by the SRS) to the SRS SMR/Designee. The SRS SMR/Designee may request any supporting documentation needed by the SRS. CCP will ensure appropriate closure of the deficiency. A copy of any

CCP NCR related to DOE TRU waste at the SRS will be provided to the SRS SMR/Designee upon request.

- [C] **IF** the deficiency or nonconformance cannot be resolved by the CCP (e.g., does not meet TRU WAC), **THEN** the specific container will be returned with all required documentation to the SRS for disposition. Once the specific container(s) have been returned to the SRS, the NCR will remain open if the container will be remediated and returned to CCP or will be closed if the condition is such that the container will not be returned to CCP (e.g., NDA indicates the container is less than 100 nanocuries per gram [nCi/g] TRU alpha activity concentration). CCP will not apply CCP HOLD TAGS to those containers which are returned as permanent rejects from CCP. Instead, CCP will affix a physical indicator (sticker or tag) that the container is returned and not certifiable for shipment to WIPP.

4.7.2 SRS-Identified Deficiencies and Nonconformances

- [A] If SRS personnel identify a non-conformant condition during container movement or handling (e.g., missing container identification tag, duplicate container number), SRS personnel will initiate nonconformance documentation in accordance with the SRS QA Program.
- [B] The SMR will ensure a copy of any NCR affecting the CCP is provided to the SPM for incorporation into the CCP Nonconformance Tracking System (as required).
- [C] The SMR will notify the CCP SRS PM and VPM of any procedure deficiencies, identified by SRS personnel, which relate to CCP characterization activities.
- [D] The SMR will notify the Transportation Certification Official (TCO) or the Mobile Loading Unit Team Lead, and the VPM of any procedure deficiencies, identified by SRS personnel, which relate to payload assembly or loading activities.

4.8 Visual Examination (VE)

- 4.8.1 CCP will conduct VE Operations in accordance with CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*, as needed, or CCP-TP-500, *CCP Remote-Handled Waste Visual Examination* using a facility provided by the SRS.

- 4.8.2 Qualified SRS personnel will manipulate waste as requested by the CCP VE operator(s) during the VE process.
- 4.8.3 VE operators will make notification to the SRS SMR, CCP SPM, and CCP VPM as necessary to comply with the SRS Safety Basis.
- 4.8.4 The SRS will perform all maintenance and repairs to the VE facility.
- 4.8.5 The SRS will provide personnel to qualify and perform VE in accordance with CCP-TP-113 or CCP-TP-500, if applicable.

4.9 Real-Time Radiography (RTR)

- 4.9.1 CCP will perform RTR using a CCP or SRS provided unit(s). Containers rejected by RTR will be dispositioned consistent with the requirements of step 4.7.
- 4.9.2 CCP may perform screening services using CCP or SRS provided unit(s) to provide information on prohibited items for use in SRS repackaging operations. CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*, will be used for RTR screening operations. The report provided from CCP-TP-066 will include any prohibited items or conditions, including all liquids identified, during the scan.
- 4.9.3 CCP RTR Operators may provide additional interpretation of scans to support other SRS repackaging activities and waste characterization/re-characterizations determined by SRS and agreed to by the CCP SRS Project Manager/Designee.
- 4.9.4 If a container is found during RTR that is suspected to contain a classified item/shape, it will be segregated and handled in accordance with SRS procedures. Additional information will be provided by SRS to support interpretation of RTR results in KAC.
- 4.9.5 If RTR results meet the identified SRS Safety Basis, S&S, and/or NMC&A notification criteria, CCP RTR personnel will immediately notify the SRS SMR, CCP SPM, and CCP VPM.
- 4.9.6 The SRS is to support the CCP VPM with the construction of RTR capability demonstration drums as required.
- 4.9.7 If a later review (e.g., ITR, SPM) meets a SRS Safety Basis, S&S, and/or NMC&A notification criteria, notifications will immediately be made.

4.10 Nondestructive Assay (NDA)

- 4.10.1 The SRS will provide support for CCP participation in the NDA PDP. This support includes maintaining trained PDP Sample Preparation Team members, preparation of the test containers, delivery and pick-up of the containers to/from the CCP NDA equipment, and responsibility for PDP source control. The SRS support will be coordinated by the SMR/Designee.
- 4.10.2 If NDA results meet the identified SRS Safety Basis, S&S, and/or NMC&A notification criteria, CCP NDA personnel will immediately make notifications. If notification levels are reached, NDA EA analysis will be performed and the resulting conclusions will be communicated both verbally and in writing to the SRS SMR, SPM, and the CCP VPM within 24 hours of the first normal work day following the assay.
- 4.10.3 If a later review (e.g., ITR, SPM) meets a SRS Safety Basis, S&S, and/or NMC&A notification criteria, notifications will immediately be made.
- 4.10.4 CCP will perform NDA using a CCP or SRS provided unit or multiple units. Containers rejected by NDA will be dispositioned consistent with the requirements of step 4.7.
- 4.10.5 CCP will provide SRS with access to validated BDRs for disposal of LLW/MLLW from the certified program, as necessary.
- 4.10.6 For KAC, SRS will provide calibration standards and working standards, including relevant documentation, for use with KAC NDA equipment.
- 4.10.7 For KAC, SRS may require CCP to perform additional NDA runs to resolve S&S and/or NMC&A anomalies, deficiencies, or nonconformances.

4.10.8 NDA equipment in KAC will also be controlled and maintained in accordance with SRNS 14Q Manual, Procedure 3.06, *Nondestructive Assay Measurement Control*.

4.11 Radiological Characterization (RC) (Dose-to-Curie [DTC])

4.11.1 The SRS will provide technical support for radiological characterization efforts based on the use of AK for RH TRU waste or sampling and analysis.

4.11.2 CCP will provide qualified personnel to perform radiological characterization activities.

4.11.3 If DTC results meet the identified SRS Safety Basis notification criteria, CCP DTC personnel will immediately make notifications as required. If notification levels are reached, DTC results will be performed and the resulting conclusions will be communicated both verbally and in writing to the SRS SMR, CCP SPM, and the CCP VPM within 24 hours of the first normal work day following the assay.

4.11.4 If a later review (e.g., ITR, SPM) meets a SRS Safety Basis notification criteria, notifications will immediately be made.

4.11.5 The SRS will provide support for the CCP for performing calibration of RC instrumentation. This support includes delivery of surrogate drums and source control as needed.

4.12 Chemical Waste Sampling and Analysis Methods

4.12.1 If the Permittees determine that additional characterization is necessary using chemical sampling and analysis, the Permittees shall direct SRS to provide the Permittees with the following documentation:

- Sampling and analysis plan
- EPA SW-846 test method(s), or functionally equivalent test method(s), to be used
- Identification of the laboratory(ies) that will be performing the test(s)

4.12.2 Upon the Permittees written approval of the sampling and analysis plan, SRS shall implement the sampling and analysis plan.

4.13 Flammable Gas Analysis (FGA)

4.13.1 FGA is for transportation only and will be performed using approved DOE/WIPP procedures by personnel trained under the CCP Qualification Program.

4.13.2 FGA operators will make notifications to the SRS as necessary to comply with the SRS Safety Basis. These Notifications will be made to the SRS SMR, CCP SPM, and the VPM.

4.14 Source Control

4.14.1 CCP will provide a list of reference sources required for calibration of NDA systems used by CCP.

4.14.2 The SRS will be responsible for all reference sources. Responsibilities consist of inventory control, storage, shipment, and usage. The SRS will provide CCP the number of sources, location, isotopic distribution with activity levels, and the names of the custodian and authorized users, as required.

4.14.3 The SRS will be responsible for providing radiological control support associated with the reference sources. This support consists of maintaining the radioactive materials area postings, periodic surveys and performing a semi-annual leak check on the sources.

4.14.4 SRS personnel will deliver the sources to qualified CCP personnel for loading into the matrix drums. CCP personnel will be trained as users of the sources to the SRS procedures.

4.14.5 The SRS will provide support for the CCP participation in the PDP. This support includes maintaining trained PDP Sample Preparation Team members, preparation of the test drums, delivery and pick-up of the drums to/from the CCP NDA equipment, and responsibility for PDP source control. SRS support will be coordinated by the SRS SMR/Designee.

4.14.6 Radioactive sealed sources will be controlled under applicable requirements of the SRS Radiological Control Program.

4.14.7 The SRS will provide support for leak testing, labeling, and inventory control for sealed sources used by CCP NDA processes.

4.14.8 The SRS may provide radioactive sealed sources to the CCP NDA processes when required for use in meeting NDA quality assurance objectives.

4.14.9 CCP will submit a written request to SRS before bringing or shipping any sealed radioactive source to SRS. The request will be accompanied by a copy of the applicable Radioactive Materials License or DOE exemption, along with applicable source documentation, such as Certificates of Calibration or Nominal Source Certificates. SRS will provide written permission to CCP to bring or ship sealed radioactive sources to SRS upon receipt and approval of CCP's written request.

4.14.10 CCP will provide day-to-day control of the sources it uses in accordance with requirements in the SRS Radiological Control Program.

4.15 Acceptable Knowledge (AK)

- [A] CCP records personnel will maintain the auditable AK record necessary to support the AKSR in accordance with CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*, and CCP-QP-008, *CCP Records Management*.
- [B] CCP AK Personnel collect, compile, and review AK documentation in accordance with CCP-TP-005 and/or DOE/WIPP-02-3214, *Remote-Handled TRU Waste Characterization Program Implementation Plan (WCPIP)*.
 - SRS/generator personnel assist CCP AK personnel with AK collection.
 - CCP AK personnel and SRS site/generator personnel will cooperate fully with each other in the sharing and exchange of any and all AK information that is collected for or incorporated into IWMDLs or AKSRs.
- [C] AK Summary Reports (AKSRs), Chemical Compatibility Evaluations (CCEs), Acceptable Knowledge Assessments (AKAs), and Basis of Knowledge Evaluations/Exemptions (BOKs) are submitted to SMR for distribution to cognizant personnel (CP) for initial and final document classifications.
- [D] CCEs and BOKs are performed in accordance with CCP-TP-005.
 - CCP provides SMR with the CCE and/or BOK draft.

- SMR distributes CCE and/or BOK draft to designated SRS CP for review and comment.
- AKE resolves comments with SMR and CP.
- SMR concurs with the final CCE and/or BOK in writing.

[E] AKAs are performed in accordance with CCP-TP-005.

- CCP provides SMR with the AKA draft.
- SMR distributes the AKA draft to designated SRS CP for review and comment.
- AKE resolves comments with SMR and CP.
- SMR concurs with final AKA in writing.

[F] CCP submits new or revised AKSR to the SMR/Designee for review and concurrence.

- The SMR ensures SRS CP review the AKSR for accuracy and completeness providing comments in accordance with CCP-QP-010.
- AKE resolves comments with SMR and SRS CP.
- SMR concurs with final AKSR in writing.

[G] SRS site/generator CP attends briefing on new or revised AKSR.

[H] CCP AK personnel and SRS/generator personnel develop an IWMDL for each waste stream. Each IWMDL will include facility processes, plans, and procedures that control the following waste management activities as applicable:

- Waste generating activities
- Waste retrieval activities
- Waste packaging/repackaging
- Waste treatment/processing (e.g., neutralization, deactivation, and solidification/immobilization)

- Waste inspection, testing, and characterization
 - Decontamination and Decommissioning (D&D) Operations
 - Any other activity that changes the physical, chemical, or radiological properties of waste to be characterized by CCP
- [I] The SMR ensures POCs/SMEs are assigned to review the new or revised IWMDLs for accuracy and completeness and provide written comments as appropriate.
- [J] SRS/generator CP notifies the SPM and AKE in writing of any new revised waste management activities that would necessitate a change to an IWMDL.
- [K] The SPM and AKE evaluate new or revised waste management activities and determine if revision to the IWMDL and/or AKSR is required.
- [L] The SRS will not provide any waste containers to CCP for characterization until the AKE has received that latest version of the work document (including field changes, other immediate procedure changes, Timely Orders/Standing Orders, Operator Aids, etc.) used to generate, package, and/or repackage the container.
- [M] The work document(s) provided to the AKE will contain the following information at a minimum:
- Identification (including revision) of the work document(s) used to generate the container
 - Type of activity (e.g., packaging/repackaging only, remediation, treatment)
 - Amount (estimated) and type (if known) of liquids
 - Type and quantity (estimated) of absorbents used
 - Type and quantity (estimated) of neutralization agents used
 - Any unexpected conditions or reactions encountered
 - General description of waste items
 - Packaging configuration (e.g., 55-gallon drum with 20 mil liner bag)

- Filter data including model and quantity used
- Parent container identification

[N] At a minimum of once per calendar quarter, SRS/generator management/SMR will review current IWMDLs and provide written assurance to the CCP SPM that the list is up to date **OR** provide necessary documentation to revise the list for waste streams expected to generate additional containers of TRU waste or if containers in the waste stream will be repackaged or remediated. Revision to the IWMDL can serve to meet the Quarterly SRS/generator management/SMR Notification requirement.

4.16 Project Office Certification Activities

- 4.16.1 CCP Project Office certification activities consist of project-level review of BDRs, lot evaluations, data validation, and WWIS/WDS data entry. CCP Project Office certification activities will be conducted using personnel trained under the CCP Certified Program.
- 4.16.2 CCP will prepare WSPFs for the subject SRS waste in accordance with CCP-TP-002, *CCP Reconciliation of DQOs and Reporting Characterization Data*.
- 4.16.3 CCP shall submit WSPFs to the SRS for review before submittal to CBFO. The SRS will provide written concurrence on the basis of continued compliance with procedures and programs, and CBFO-certification of the CCP program.
- 4.16.4 CCP will transmit characterization and certification data using the WWIS/WDS and CCP procedures CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry* or CCP-TP-530, *CCP RH TRU Waste Certification and WWIS/WDS Data Entry*.
- 4.16.5 The CCP WCO will document and certify that all TRU waste payload containers meet the requirements of the WAC, and submit the data to the WWIS/WDS for approval.
- [A] All containers characterized in KAC will be placed on Administrative Hold by SRS until they have been approved by SRS NMC&A and KAC management. Some containers will remain on Administrative Hold for continued use as working standards until all associated containers have been certified by CCP and approved by SRS NMC&A. SRS will communicate to CCP when containers are no longer on Administrative Hold.

- [B] A CCP Vendor Project Manager (VPM) Administrative Hold Tag will be placed in parallel with the SRS Administrative Hold to prevent the container from progressing through the certification process for shipment.

4.16.6 The WCO will provide the Transportation Certification Official (TCO) with all certification information necessary to certify the payload for transportation.

4.17 Transportation – Contact-Handled (CH) Waste/Remote-Handled (RH) Waste

4.17.1 CH Waste

- [A] The SRS will provide and maintain CH Package Loading facilities.
- [B] NTP Transportation will provide technical resources, TCOs, and qualified personnel to perform the transportation certification, preparation of the shipment, and loading of the waste for shipment.
- [C] The SRS will provide the equipment and trained personnel required to handle waste containers for payload assembly and loading operations.
- [D] NTP Transportation will provide trained personnel required to handle waste containers for payload assembly and loading operations.
- [E] The SRS will provide manifesting, marking, labeling, and placarding of the shipments in accordance with 40 Code of Federal Regulations (CFR) and 49 CFR requirements and in accordance with site-specific procedures.
- [F] NTP Transportation will provide documentation to the SMR certifying the waste for shipment according to CCP procedures.
- [G] The SRS will coordinate the shipment, including providing prerequisite surveys.

4.17.2 RH Waste

- [A] The SRS will provide and maintain RH TRU 72-B transportation cask loading facilities and Shielded Container Assembly (SCA) loading facilities, as needed.

- [B] NTP Transportation will provide technical resources and personnel to perform the transportation certification, preparation of the shipment, and loading of the waste for shipment.
- [C] The SRS will provide the equipment and trained personnel required to handle waste containers for payload assembly and RH TRU 72-B loading operations.
- [D] NTP Transportation will provide trained personnel required to handle waste containers for payload assembly and cask loading operations.
- [E] The SRS will provide manifesting, marking, labeling, and placarding of the shipments in accordance with 40 CFR and 49 CFR requirements and in accordance with site-specific procedures.
- [F] NTP Transportation will provide documentation to the SMR certifying the waste for shipment according to CCP procedures.
- [G] The SRS will coordinate the shipment, including providing prerequisite surveys.

4.18 Quality Assurance (QA)

4.18.1 All quality affecting work performed in the completion of this waste characterization, certification, and shipping scope will be in compliance with applicable DOE/CBFO-certified, CCP procedures.

4.18.2 NWP QA will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.

4.18.3 SRS will conduct surveillances to assess compliance with applicable procedures.

4.19 Measuring and Test Equipment (M&TE)

4.19.1 M&TE used by the CCP will be controlled and maintained in accordance with CCP-QP-016, *CCP Control of Measuring and Testing Equipment*.

- 4.19.2 The SRS will make available National Institute for Standards and Technology (NIST)-traceable calibration services for M&TE to the CCP. The SRS will maintain records on M&TE calibration in accordance with the Records Inventory and Disposition Schedule. Copies of the Certificates of Calibration will be made available to the CCP VPM and CCP M&TE Custodian prior to issuing M&TE to CCP for use.
- 4.19.3 For SRS M&TE furnished for use in the CCP program, the SRS SMR or Designee will provide notification to the CCP M&TE Custodian when M&TE are added, deleted, found out-of-tolerance /defective, or failed calibration.
- 4.19.4 When notified of an as found, failed calibration CCP will perform an extent of condition review to assess its impact on any CCP activities, initiate an NCR (if applicable) and provide this info to the SRS SMR/SRS M&TE Custodian.
- 4.19.5 The SRS SMR/Designee will make calibration documentation and processes accessible as needed for internal and external audits.
- 4.19.6 The CCP M&TE Custodian will provide a recall notification for CCP M&TE that requires calibration to the SRS SMR/M&TE Custodian.
- 4.20 Work Standards
 - 4.20.1 CCP operations personnel will work under applicable SRS Manual 8Q procedures. See Attachment 1.
 - 4.20.2 CCP and SRS site-provided personnel will perform quality-affecting work under CCP procedures for TRU waste characterization and certification activities.
 - 4.20.3 SRS procedures and work packages will be used for non-waste characterization and shipping activities (e.g., equipment repairs).
 - 4.20.4 SRS maintenance may assist CCP with equipment maintenance. All activities will meet CCP configuration and maintenance requirements and be authorized by the CCP VPM.
 - 4.20.5 CCP operations personnel will operate in accordance with CCP-PO-005.
 - 4.20.6 CCP personnel will comply with applicable SRS procedures for activities they perform outside of the CCP system of controls. See Attachment 1.

- 4.20.7 CCP **personnel** will work under the SRS Safety Basis and work control standards. Maintenance work control activities on SRS-supplied equipment and CCP owned/leased equipment will be controlled using SRS work authorization procedures.
- 4.20.8 CCP-CM-001, *CCP Equipment Change Authorization and Documentation*, CCP-PO-026, *CCP Configuration Management*, and CCP-TP-140, *CCP Equipment Maintenance* will be followed for CCP owned/leased equipment.
- 4.20.9 The SRS will not change the configuration of any characterization equipment used by CCP – regardless of ownership – without first obtaining written concurrence from the CCP VPM.
- 4.20.10 The CCP SRS PM or VPM will notify the SRS SMR/Designee when new CCP personnel, (NWP and subcontractors) are assigned to work at the SRS. This notification will occur as soon as is practical.
- 4.20.11 The CCP SRS PM or CCP VPM will notify the SRS SMR when CCP personnel, NWP and subcontractors leave the SRS as a result of reassignment or resignation. This notification will occur as soon as is practical.
- 4.20.12 The SRS SMR will notify affected organizations to support the arrival or departure of CCP personnel.
- 4.20.13 SRS Radiological Controls personnel will perform routine surveys for contamination and radiation as specified in SRS policies or procedures. The CCP SRS PM or CCP VPM and appropriate SRS management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied areas. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.20.14 The SRS will immediately notify the CCP SRS PM or CCP VPM and appropriate SRS management personnel of any abnormal continuous or fixed air sample filter analysis results from any area routinely occupied by CCP personnel.
- 4.20.15 CCP will provide historical information on the operation of any CCP equipment deployed at the SRS for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned.

4.20.16 For SRS-supplied equipment and facilities, the SRS is the Design Authority. It is expected that CCP will participate in review of hazard analysis for this equipment and facilities being provided.

4.20.17 For non-SRS-provided equipment, CCP will provide the SRS with information and documentation necessary for evaluation of compliance with the SRS Safety Basis. CCP will be the Design Authority for the equipment. The programmatic limits for the operation of the characterization equipment are the responsibility of CCP as part of their Design Authority responsibilities.

4.20.18 CCP will control the procurement, development, maintenance, configuration management, and use of software used on all SRS and non-SRS-provided equipment used to develop quality-affecting data for waste characterization in accordance with CCP-QP-022, *CCP Software Quality Assurance Plan*.

4.21 Project Control

4.21.1 CCP and the SRS will provide routine status for their respective scheduled activities.

4.21.2 CCP will maintain and provide the SRS with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.

4.22 Procedures

4.22.1 CCP will develop new or revised procedures in accordance with CCP-QP-010.

NOTE

New technical operating procedures (procedures that operate equipment) developed by CCP and scheduled to be used at the SRS, shall be evaluated by the SRS SMR to determine if the procedure shall be added to the SRS review list.

4.22.2 The SMR will review or designate the appropriate reviews of the applicable CCP procedures, and forward written comments to CCP Document Control in accordance with CCP-QP-010.

4.22.3 The SPM will confirm that the SMR/Designee written comments are resolved with the host facility SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.22.4 The following documents and all revisions will be provided to the SMR for SRS review. This review may be waived if the operational activity is not being performed at the site. Waived procedures will be reviewed before CCP operations commence utilizing the un-reviewed procedure.

- CCP Basis of Knowledge Evaluations/Exemptions
- CCP Chemical Compatibility Evaluations
- CCP Interface Waste Management Document Lists
- CCP Acceptable Knowledge Assessments
- CCP SRS Acceptable Knowledge Summary Reports
- CCP Waste Stream Profile Forms
- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-CM-013, *CCP Transportation Flammable Gas Analysis (FGA) Equipment Description*
- CCP-CM-039, *CCP Mobile ISOCS Large Container Counter (MILCC-06) Equipment #NDA-MILCC-06 Equipment Description*
- CCP-PO-004, *CCP/SRS Interface Document*
- CCP-PO-026, *CCP Configuration Management*
- CCP-TP-021, *CCP Real-Time Radiography #8 Operating Procedure*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- CCP-TP-053, *CCP Standard Real-Time Radiography (RTR) Inspection Procedure*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-058, *CCP NDA Performance Demonstration Program*

- CCP-TP-066, *CCP Radiography Screening Procedure for Prohibited Items*
- CCP-TP-068, *CCP Standardized Container Management*
- CCP-TP-076, *CCP Operating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-077, *CCP Calibrating the Mobile ISOCS Large Container Counter Using NDA 2000*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-087, *CCP Scale Operations*
- CCP-TP-113, *CCP Standard Contact-Handled Waste Visual Examination*
- CCP-TP-140, *CCP Equipment Maintenance*
- CCP-TP-204, *CCP Calibrating the Savannah River Site High Efficiency Neutron Counters 4 & 5 (HENC4 & HENC5) Using NDA 2000.*
- CCP-TP-205, *CCP Operating the Savannah River Site High Efficiency Neutron Counters 4 & 5 (HENC4 & HENC 5) Using NDA 2000*
- CCP-TP-500, *CCP Remote-Handled Waste Visual Examination*
- CCP-TP-504, *CCP Dose-to-Curie Survey Procedure for Remote-Handled Transuranic Waste*
- CCP-TP-505, *CCP Removable Lid Canister/Neutron Shielded Canister Loading*
- CCP-TP-507, *CCP Shipping of Remote-Handled Transuranic Waste*
- CCP-TP-509, *CCP Remote-Handled Transuranic Container Tracking*
- CCP-TP-512, *CCP Remote-Handled Waste Sampling*
- CCP-TP-554, *CCP Remote-Handled Grapple Pre-Operational Checks and Operation*

4.22.5 Upon receipt of a document listed the SMR/Designee will ensure the document is reviewed by the cognizant person responsible for the waste management activities relevant to the scope of the document.

4.22.6 As warranted, the SMR/Designee will provide written comments to CCP using Document Review Record (DRR) in accordance with CCP-QP-010.

4.22.7 The CCP SPM will confirm that the SMR/Designee written comments are resolved with the Host site SMR/Designee concurrence prior to proceeding with CCP operations under the scope of the document being reviewed.

4.22.8 The SMR will be notified when any CCP procedure listed in the Procedures section of this document is approved for use.

4.22.9 The following documents will be sent to the SMR as "Notify Only" during the review process:

- CCP-HSP-014, *CCP Health and Safety Program Implementation*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- CCP-QP-018, *CCP Management Assessment*
- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods For Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-PO-006, *CCP Conduct of Operations Matrix*
- CCP-PO-050, *CCP TRUPACT-III TRU Waste Authorized Methods For Payload Control (CCP TRUPACT-III TRAMPAC)*
- CCP-PO-505, *CCP Remote-Handled Transuranic Waste Authorized Methods for Payload Control (CCP RH-TRAMPAC)*

- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-TP-005, *CCP Acceptable Knowledge Documentation*
- CCP-TP-048, *CCP NDA System Data Reviewing, Validating, and Reporting Procedure*
- WP 15-GM1002, *Integrated Issues Management*

4.22.10 The following documents are controlled by DOE/CBFO and, upon CCP receiving notification of issuance/revision, CCP shall notify the SMR.

- DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant*
- DOE/WIPP 02-3183, *CH Packaging Program Guidance*
- DOE/WIPP 02-3184, *CH Packaging Operations Manual*
- DOE/WIPP 02-3185, *CH Packaging Maintenance Manual*
- *CH Work Instructions*
- DOE/WIPP 11-3456, *TRUPACT-III Program Guidance*
- DOE/WIPP 11-3451, *TRUPACT-III Operations Manual*
- *TRUPACT-III Work Instructions*
- DOE/WIPP 02-3283, *RH Packaging Program Guidance*
- DOE/WIPP 02-3284, *RH Packaging Operations Manual*
- DOE/WIPP 02-3285, *RH Packaging Maintenance Manual*
- *RH Work Instructions*
- DOE/WIPP 06-3345, *Waste Isolation Pilot Plant Flammable Gas Analysis*

4.23 Documents

4.23.1 Documents listed in this section, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, formal correspondence, or as requested by SPM or SMR. Documents identified as QA records will be transmitted via CCP-QP-008.

4.23.2 Documents/Electronic Data to be provided to SRS by CCP include, but are not limited to:

[A] List of equipment requiring calibration.

- [B] Electronic NCR data and copies of Issue Notices, as applicable.
- [C] Copies of the NDE results for containers requiring notification per Section 4.9.5 or 4.9.7.
- [D] Copies of NDA results for containers requiring notification per Section 4.10.2 or 4.10.3.
- [E] Copies of all NDA data from KAC NDA equipment, including measurement control documentation (e.g., control charts).
- [F] Copies of AKSRs.
- [G] Data Quality Objective Reconciliation Documentation, as requested by SRS.
- [H] Cross-reference of containers to BDRs, as requested by SRS.
- [I] Material Safety Data Sheets (MSDS)/Safety Data Sheets (SDS).

4.23.3 Documents to be provided to CCP by SRS include, but are not limited to:

- [A] Copies of calibration certifications.
- [B] Documentation for calibration standards and working standards provided for KAC NDA.
- [C] Documentation of training completion for CCP personnel for training received from SRS.
- [D] Documentation of information for container modifications.
- [E] AK source documentation requested by CCP.
- [F] Radiological dose rate and surface contamination results on waste containers as needed to support WWIS/WDS data entry.
- [G] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to CCP activities.

[H] Copies of the Uniform Hazardous Waste Manifest, bill of lading and Shipment Notifications.

4.24 Authorization Basis (AB) and Configuration Management

4.24.1 The SRS has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the DOE-approved SRS documented safety analysis.

4.24.2 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with CCP procedures that protect the personnel, public, and environment.

4.24.3 For CCP-provided equipment, CCP will provide the documentation necessary for SRS to perform the evaluation against its safety analysis. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and SRS.

4.24.4 For SRS-provided equipment, CCP will review operational documentation to ensure the safety of CCP personnel while operating the equipment.

4.24.5 All changes to equipment operated by CCP will be controlled by the SRS Work Control Program to ensure appropriate SRS AB evaluations are conducted, and associated controls established.

[A] For equipment in KAC, all changes to equipment operated by CCP will also be reviewed to ensure appropriate NMC&A evaluations are conducted, and associated controls established and maintained.

4.24.6 The SRS will submit all changes to AB requirements that affect CCP operations for review and concurrence by CCP prior to implementation.

4.24.7 CCP has primary responsibility to ensure changes to equipment are in accordance with CCP-CM-001.

4.25 Notification

4.25.1 The SRS has primary responsibility to notify CCP when there are changes in the SRS facilities used by CCP that may impact operations.

4.25.2 The SRS has primary responsibility to notify CCP when there are changes to policies, processes, or procedures that may affect CCP activities.

4.25.3 CCP has primary responsibility to notify the SRS when there are configuration changes to CCP or CCP vendor-owned equipment.

4.25.4 The SRS has a responsibility to notify CCP when repairs or modifications are needed on the CH or RH transportation trailers, packaging equipment, or casks.

4.25.5 CCP is responsible for performing or coordinating repairs and modifications to the CH or RH transportation trailers, packaging equipment, or casks.

4.25.6 CCP has a responsibility to notify SRS when KAC NDA equipment is out of control (OOC) per measurement control program requirements.

4.25.7 The SRS has a responsibility to notify CCP of removal of SRS Administrative Hold from containers.

4.26 Procurement

4.26.1 SRS is shown as a supplier of procurement services on the NWP QSL. SRS may procure, inspect, and perform receipt inspection of whatever items are listed in the most current NWP QSL for the CCP scope of work (this is presently limited to 55-gallon drums, container filter vents, and calibrated M&TE). SRS will perform these activities in accordance with its QSL-accepted program.

4.27 Occurrence Reporting and Processing System (ORPS) and Price- Anderson Amendments Act (PAAA)

4.27.1 Both SRS and CCP maintain the responsibility for reporting potential Price-Anderson Amendments Act (PAAA) issues resulting from CCP activities (e.g., TSRs, Radiation Safety, Industrial Safety, Industrial Hygiene, Maintenance, Lockout/Tagout, Conduct of Operations) at SRS. This includes filing any Occurrence Reporting and Processing System (ORPS) reports.

4.27.2 Both SRS and CCP shall invite the other to participate in the investigation of any event that results in an ORPS or PAAA report related to CCP activities.

4.27.3 Both SRS and CCP shall support and participate in investigations when CCP activities result in an ORPS or PAAA report.

4.28 10 Code of Federal Regulation (CFR) Part 851, Worker Safety and Health Program

4.28.1 CCP personnel will work under the Host Site 10 code of Federal Regulations (CFR), Part 851, *Worker Safety and Health Program*, regulations and applicable procedures governing the SRS program. See Attachment 1.

4.29 Drum Venting – not applicable in this interface

4.30 Gas Generation Test (GGT) – not applicable in this interface

5.0 RECORDS

5.1 Records generated during the performance of the waste characterization and certification scope are controlled by CCP.

5.2 Records generated during the performance of this procedure are maintained as QA records in accordance with CCP-QP-008 and dispositioned in accordance with CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*. The records are the following:

5.2.1 QA/Nonpermanent Records

[A] Written comments from SRS (e.g., memo, e-mail)

5.3 The SRS will maintain the following records in accordance with the Host site requirements. The list includes, but is not limited to, the following:

5.3.1 MSDSs/SDSs

5.3.2 Calibration Certifications

6.0 OVERSIGHT

- 6.1 The SRS will accept successful completion of the CBFO certification audit as adequate evidence that the CCP implementation at the SRS is fully compliant with waste disposal requirements as set forth in the CH and RH WAC and WAP.
- 6.2 Following successful completion of the CBFO certification audit, the SRS QA will conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures. These surveillances will be conducted in accordance with SRS QA procedures
- 6.3 The SRS QA will provide copies of its surveillance reports to the CCP SPM. The CCP SPM and NWP QA will take the following actions:
 - 6.3.1 Review the SRS surveillance reports for any finding or other deficiencies against the CCP scope of work.
 - 6.3.2 Document and perform corrective actions in accordance with applicable NWP issues management procedures.
 - 6.3.3 Provide SRS QA with CCP actions to correct the identified deficiencies.
 - 6.3.4 NWP QA will maintain an information file of the SRS surveillance reports conducted on the CCP scope of work.

Attachment 1 – SRS Reference Documents

Site-Level Procedures Applicable to CCP/MLU Staff:

13B Chemical Management Manual

- Procedure 2.3 SRS Hazard Communication Program
- Procedure 2.5 Compressed Gases and Cryogenic Fluids Purchasing, Handling, Storage, and Use

3Q Environmental Compliance Manual

- Procedure 2.3 Best Management Practices
- Procedure 2.4 Spill Prevention Control and Countermeasure (SPCC)

4Q Industrial Hygiene Manual

- Procedure 501 Noise Control Program
- Procedure 502 Thermal Stress Management
- Procedure 1301 Respiratory Protection Program Responsibilities and Program Overview

7Q Security Manual

- Procedure 301 Physical Security Requirements, General
- Procedure 311 Security Badges
- Procedure 312 Prohibited and Controlled Articles
- Procedure 313 Escort Requirements (See Note 1)

8Q Employee Safety Manual

- Procedure 1 Safety Principles and Program Responsibilities
- Procedure 9 Barricades
- Procedure 11 Pedestrians, Equipment Operations, Vehicles and Other Methods of Transportation
- Procedure 12 General Site Safety Requirements
- Procedure 16 Ladder and Scaffold Safety Requirements
- Procedure 32 Hazardous Energy Control (Lockout/Tagout)
- Procedure 61 Personal Protective Equipment
- Procedure 63 Fall Protection Devices and Systems
- Procedure 117 Hand and Portable Power Tools

Attachment 1 – SRS Host Site Reference Documents (Continued)

10Q Cyber Security Manual

- Procedure 602 Cyber Security Code of Conduct

14Q Nuclear Material Control and Accountability (NMC&A)

- Procedure 3.02 Selection, Validation, and Qualification of New Accountability Measurement Methods (See Note 2)
- Procedure 3.06 Nondestructive Assay Measurement Control (See Note 2)

18Q Safe Electrical Practices and Procedures

- Procedure 1 Electrical Safety Program and Responsibilities

2S Procedure Conduct of Operations

- Procedure 2.1 Task Preparation and Post-Job Review
- Procedure 2.3 Notifications
- Procedure 3.1 Required Reading
- Procedure 5.2 Issue Investigations
- Procedure 5.6 Operations Tags Use and Control
- Procedure 5.7 Verification Methodologies
- Procedure 5.9 Hazardous Energy Control
- Procedure 5.14 Control of Interrelated Processes

1Y Conduct of Maintenance Manual

- Procedure 8.20 Work Control Procedure
- Procedure 9.01 Post Maintenance Testing

SRS Lower-Tier Procedures Applicable to CCP / MLU Staff:

5Q1.1 Radiation and Contamination Control Procedures

- Procedure 502 Radioactive Source Accountability and Control

TM-90-7 SRS Hoisting and Rigging Manual

- Procedure 8 Lift Trucks (Spotter)
- Procedure 12 Hoists
- Procedure 14 Below-The-Hook Lifting Devices
- Procedure 15 Rigging Hardware

Note 1: Escorts are required for uncleared staff working in the K-Area Limited Area. Other areas where CCP / MLU work is performed, including E-Area and S-Area, do not require Escorts for uncleared staff.

| Note 2: The HENCs used in K-Area Complex are used for compliance with NMC&A requirements.

Figure 1. Central Characterization Program Interface with SRS

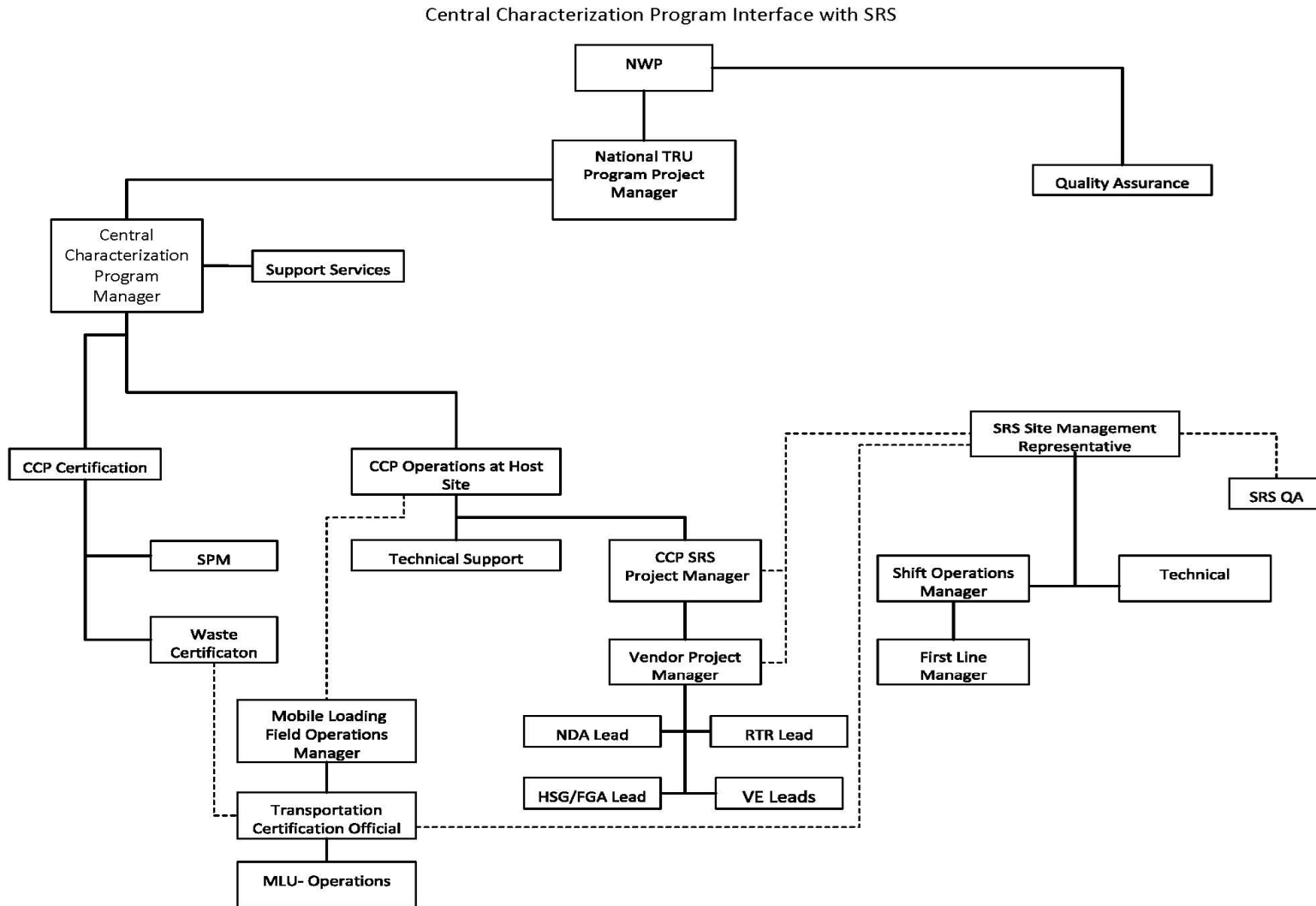


Figure 2. SRS Road Map

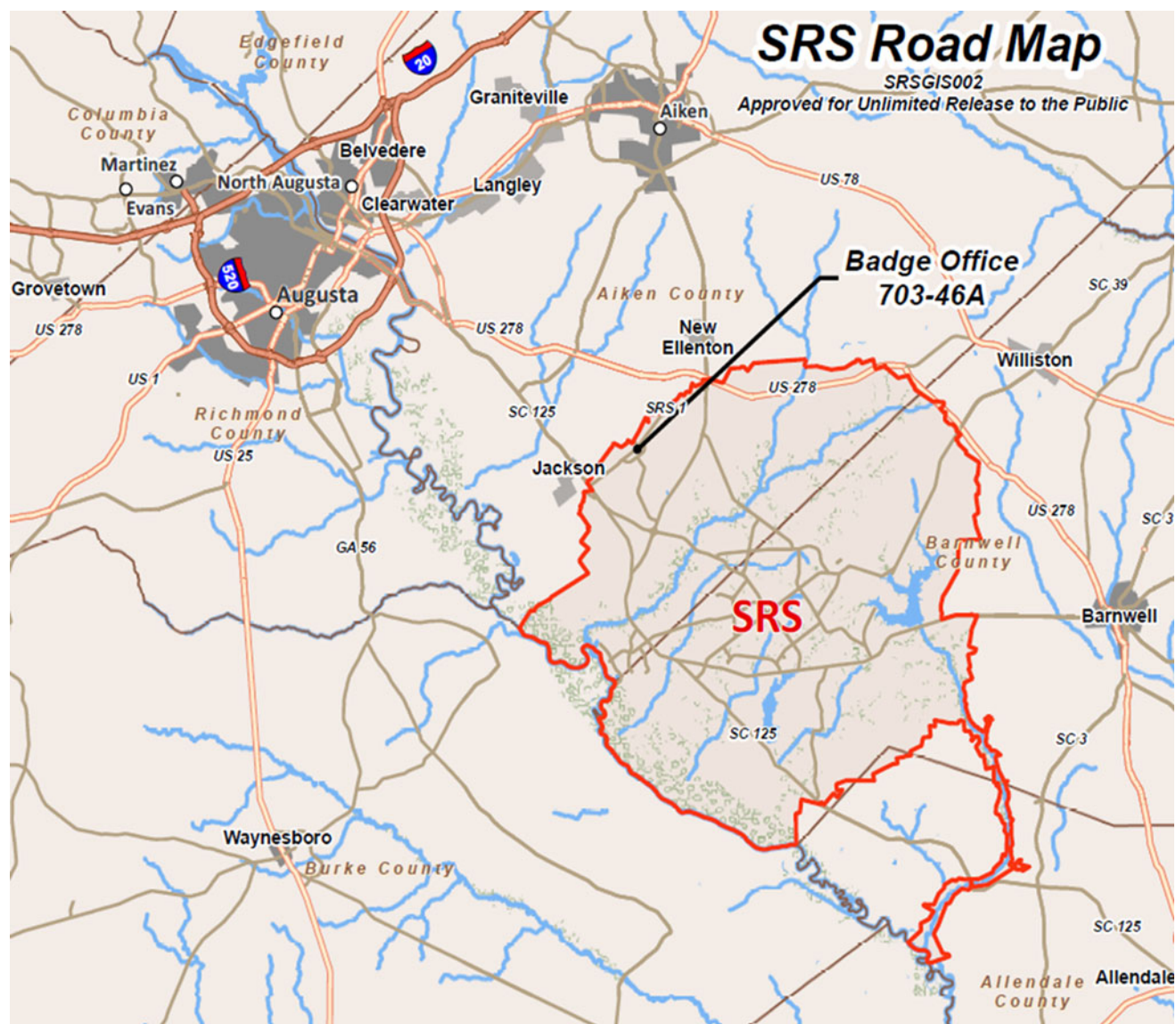
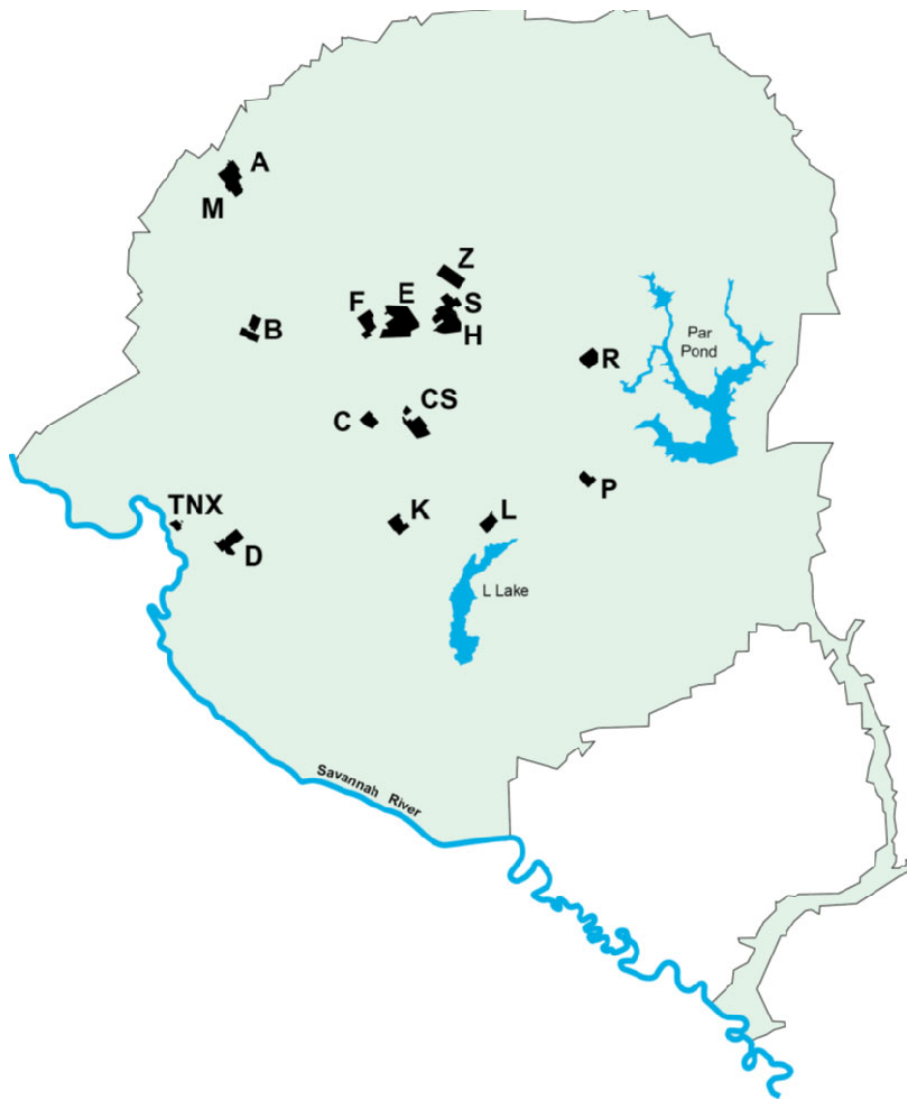


Figure 3. SRS Area Map



CCP-PO-042

Revision 3

CCP/WCS Interface Document

EFFECTIVE DATE: 05/25/2021

Daniel Wade

PRINTED NAME

APPROVED FOR USE

RECORD OF REVISION

Revision Number	Date Approved	Description of Revision
0	03/25/2014	Initial issue.
1	05/08/2014	Revised to include Central Characterization Program (CCP)/Waste Control Specialists, LLC (WCS) contact-handled (CH) transuranic (TRU) Waste Inventory Control and CCP Notifications for Intersite Shipment of Characterized CH TRU Waste as documents for WCS technical reviewer (TR)/Designee review. Also includes minor editorial changes.
2	06/24/2020	Revised to remove the specific Quality Assurance Program Document (QAPD) section reference from step 4.3.1[C], as to avoid any inconsistencies between this procedure and the DOE/WIPP QAPD, if it were to be revised and removed CCP-QP-040 reference per CCP-SO-127.
3	05/25/2021	Minor Change - Updating title of WP 15-GM1002 <i>Integrated Issues Management</i> and correcting Waste Isolation Pilot Plant (WIPP) Forms to Issue Notices.

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1.0 PURPOSE

The Central Characterization Program (CCP) is a mobile program designed to characterize, certify, and transport transuranic (TRU) waste from various U.S. Department of Energy (DOE) sites to the Waste Isolation Pilot Plant (WIPP) in New Mexico. The CCP is operated by Nuclear Waste Partnership (NWP), at the direction of the DOE Carlsbad Field Office (DOE-CBFO).

DOE-CBFO has deployed a portion of the CCP to Waste Control Specialists, LLC (WCS), located on the New Mexico/Texas border adjacent to Eunice, NM. CCP has been deployed to this site as the agent for the DOE-CBFO for the preparation of the shipment of TRU waste to WCS from various DOE TRU generator sites, assistance of unloading contact-handled (CH) TRU waste at WCS, and the loading and shipment of CH TRU of waste at WCS.

This document defines the interfaces between the CCP and WCS organization(s) necessary to perform this work. This document is invoked contractually via a Statement(s) of Work (SOW) between WCS and NWP. This document is intended to clarify and expand on details contained in the upper tier SOW and program documents, but does not limit the obligations, representations or warranties of NWP or WCS under the contract documents.

CCP has responsibility for waste certification and transportation activities as defined in the SOW. CCP services include: providing and developing waste stream profiles for WCS review and approval along with subsequent container/shipment specific data as related to the WCS waste acceptance process; certification of outgoing TRU waste shipments to WIPP; support for CH TRU Package unloading and loading operations. All CCP work will be performed in accordance with CCP and/or DOE-CBFO certified procedures and, as required, (by the subcontract), with WCS site procedures.

These services will be performed with CCP and/or WCS equipment with appropriate WCS procedures and DOE-CBFO certified procedures, as appropriate. Services provided by CCP comply with DOE/WIPP-02-3122, *Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant* (WIPP-WAC); *Contact-Handled Transuranic Waste Authorized Methods for Payload Control* (CH-TRAMPAC); *Waste Isolation Pilot Plant Hazardous Waste Facility Permit*, Attachments C-C6, *Waste Analysis Plan* (WIPP-WAP), WCS Facility Permit and applicable Radiological License requirements; including those pertaining to waste storage and transportation. The work performed by CCP will be performed under a DOE-CBFO certified quality assurance (QA) program that meets the requirements defined in the DOE/CBFO-94-1012, *U.S. Department of Energy Carlsbad Field Office Quality Assurance Program Document*. WCS may augment CCP efforts as requested by CCP. Where applicable, services performed by WCS shall comply with CCP-certified procedures.

WCS has primary responsibility for assuring that requirements for safety (including Radiological Control, Emergency Management, Industrial Safety and Hygiene [IS&H]), security, license requirements, environmental permits, and other areas are met for CCP activities, and that CCP activities support the scheduled objectives. CCP is responsible for complying with these WCS requirements and is also responsible for performing activities in support of the WCS scheduled objectives.

Throughout this document, WCS responsibilities are limited to the specific CCP activities being conducted within their facilities.

This document addresses specific requirements for the following areas:

- Working safely
- Training and qualification
- Container management
- Deficiencies and nonconformances
- Reporting requirements, as applicable
- Acceptable Knowledge (AK)
- Measuring and Test Equipment (M&TE)
- Work standards
- Quality Assurance (QA)
- Project Control
- Procedures
- Document Transmittals
- Procurements
- Records
- Waste Certification and WWIS/WDS Data Entry
- CH Packaging
- Transportation
- Waste treatment data requirements

WCS reports conditions or concerns they have or may have regarding safety, health, QA, security, operational, or environmental implications to Texas Commission on Environmental Quality (TCEQ). CCP reports their similar issues to WCS and to DOE-CBFO.

2.0 REQUIREMENTS

This document implements the applicable requirements of the following for CCP:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- WP13-1, *Nuclear Waste Partnership LLC Quality Assurance Program Description*
- WP 15-GM.02, *Worker Safety and Health Program Description*
- DOE/CBFO-94-1012, *Quality Assurance Program Document*

3.0 RESPONSIBILITIES

3.1 Initial Setup

3.1.1 CCP is responsible for the following during initial setup:

- [A] Providing information and applicable procedures (see Section 4.10) to the WCS Subcontract Technical Representative (STR)/Designee, who will coordinate facility, QA, TRU Programs, and Environmental Safety & Health (ES&H) reviews to determine satisfactory compliance with WCS Permit and Radiological License requirements, radiological control requirements, and other safety and operational requirements.
- [B] Completing readiness activities, as needed, to support authorization of CCP activities at WCS.
- [C] Providing project support to complete administrative reviews and approvals of technical and administrative procedures or processes.
- [D] Mobilization of project management and staff.
- [E] Mobilization of equipment and supplies, as appropriate.

3.2 Operations

3.2.1 CCP is responsible for the following activities to support Operations:

- [A] Performing system start-up and calibration of CCP-operated CH Packaging equipment at WCS.
- [B] Performing safety walk-downs and management assessments.
- [C] Responding to and resolving assessment and surveillance findings for CCP CH Packaging activities.
- [D] Ensuring CCP and WCS personnel are trained in accordance with the requirements specified in Section 4.1.

- [E] Successful completion of DOE-CBFO Surveillance/Audit.
- [F] Providing container tracking support for the containers stored at WCS.

3.2.2 WCS provides the following support for CCP activities:

- [A] Radiological controls required to support transportation/storage activities in WCS facilities, including:
 - Radiological postings.
 - Radiation protection surveys, both initial and routine, on transportation equipment and approved survey reports to the CCP WCS Project Manager (PM)/Designee, as required.
 - Personnel dosimetry.
 - Dose assessments and dosimetry reports.
 - Calibrated and source-checked survey instrumentation, as required.
 - Work Control/Authorization documents or procedures to support CCP activities.
 - Bioassay (if required) sample collection, evaluation, and reports. The CCP WCS PM will be notified of any positive bioassay results as soon as is reasonably possible.
- [B] Site-specific training required to support transportation and waste handling activities at WCS facilities.
- [C] IS&H support and oversight.
- [D] Fire Protection and Emergency Management support.
- [E] Environmental impact oversight and support.
- [F] Container handling, inventory control, segregation, and storage location tracking.
- [G] Personnel to be trained and qualified under the CCP program, as needed, to support applicable CCP activities.

[H] Maintenance support activities, as needed and agreed upon by both parties.

3.3 CCP WCS Project Manager/Designee

- 3.3.1 Functions as CCP's primary interface and point-of-contact between CCP and the WCS STR/Designee for CH Packaging, TRU waste storage, and TRU certification activities.
- 3.3.2 Ensures CCP and WCS personnel are trained and qualified to perform WIPP-compliant TRU waste transportation, certification, and CH Packaging operations at WCS prior to commencement of work activities.
- 3.3.3 Confirms sufficient CH Packaging (loading/unloading) equipment is available to perform the required transportation activities at WCS.
- 3.3.4 Provides status on CCP Packaging operations to the WCS STR/Designee, as requested.
- 3.3.5 Works with the STR/Designee to release work in CCP's areas of responsibility and to accomplish mode changes for safety basis equipment that CCP operates.

3.4 NWP Quality Assurance (QA)

- 3.4.1 Functions as CCP's primary interface and point-of-contact for QA matters between CCP, WCS, and DOE-CBFO.
- 3.4.2 Validates the Nonconformance Reports (NCRs) or Issue Notices generated by CCP personnel performing CH Packaging activities at WCS, per CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*, and WP 15-GM1002, *Integrated Issues Management*.
- 3.4.3 Provides copies of NCRs or Issue Notices at initiation and upon closure for information to the WCS STR/Designee per Section 4.3.1 requirements.
- 3.4.4 Ensures that NCRs or Issue Notices are dispositioned in a timely manner in accordance with CCP-QP-005 and/or WP 15-GM1002.
- 3.4.5 Ensures receipt inspections of procured items and services are performed in accordance with CCP-QP-026, *CCP Inspection Control*, and coordinated with WCS personnel.

- 3.5 WCS Technical Representative (TR)/Designee (WCS Management Position)
 - 3.5.1 Functions as the WCS primary interface and point-of-contact between WCS's organizations and CCP's WCS PM.
 - 3.5.2 Ensures that the WCS Work Authorization Process is complete, including approval by the appropriately-qualified facility personnel as required, for proposed modifications to CCP hardware, software, or procedures prior to CCP implementing the proposed modification.
 - 3.5.3 Ensures needed site infrastructure support, such as radiological safety, hosting and rigging, and IS&H, are available for CH Packaging operations.
 - 3.5.4 Provides to the CCP PM a list of WCS specific training/training intervals required for CCP Personnel performing work at WCS.
 - 3.5.5 Ensures documentation of completed WCS specific training is provided to CCP Training per Section 4.1.3, upon request by CCP.
 - 3.5.6 Coordinates review, provides comments, and approves comment resolutions on procedures listed in Section 4.10.3 for the purpose of ensuring WCS permit and radiological license requirements are met.
 - 3.5.7 Ensures that periodic surveillances of CCP operations by WCS are conducted and reported to CCP PM.
 - 3.5.8 Distributes the CCP documents listed in Section 4.10.3 to WCS reviewers as required by WCS administrative controls.
 - 3.5.9 Reviews and, if appropriate, concurs per CCP-QP-010, *CCP Document Preparation, Approval, and Control*, on documents in Section 4.10.3 of this Interface Document.
 - 3.5.10 Provides facilities, construction services, utilities, phone services, office services, and supplies, as appropriate.
 - 3.5.11 Ensures the data packages required for TRU waste shipment receipt and storage are completed/approved in timely manner.

3.6 WCS Operations

- 3.6.1 Ensures Hoisting and Rigging equipment used to support CH Packaging operations and container movements are maintained and available for work activities.
- 3.6.2 Provides oversight of CCP field operations to ensure safe, efficient operations.
- 3.6.3 Ensures stored TRU containers are physically segregated by placing them in a clearly identified and designated holding area.
- 3.6.4 Ensures TRU containers selected for payloads/shipping are ONLY retrieved from the clearly identified and designated storage area.

3.7 WCS Line Management

- 3.7.1 WCS will provide line management authority through assigned operations and supervisor to ensure CH Packaging operations under CCP procedures are adequately conducted.
 - [A] Responsible for the day-to-day assignment of a sufficient number of qualified WCS personnel to augment operations under CCP procedures to meet CH shipment commitments.
 - [B] Provides work authorization and release in accordance with WCS policies and procedures for CH Packaging operations.
 - [C] Acts as the direct line of communication to WCS support organizations and services in support of CH Packaging operations.

3.8 CCP Waste Certification Official (WCO)

- 3.8.1 Interfaces with WCS Waste Acceptance Manager for the completion and approval of WCS documentation for waste acceptance.
- 3.8.2 Interfaces with CCP Transportation Certification Officials (TCOs) to provide CCP containers certified for receipt and storage at WCS.

3.9 WCS Waste Acceptance Manager

- 3.9.1 Ensures the timely completion and approval of WCS documentation required for waste acceptance.

3.10 CCP Transportation Certification Official (TCO)

- 3.10.1 Functions as CCP's primary interface and point-of-contact between CCP and the WCS Technical Representative (TR)/Designee for CH Packaging field operations.
- 3.10.2 Provides daily pre-operations briefing.
- 3.10.3 Ensures that in-process documents and the documents listed in Section 4.11.2 are transmitted to the CCP Project Office as soon as practicable per CCP-QP-008, *CCP Records Management*.
- 3.10.4 Ensures applicable Material Safety Data Sheets (MSDS) are maintained, available to support operations, and have been approved by and provided to the WCS TR/Designee.
- 3.10.5 Provides oversight of CCP field operations to ensure safe, efficient operations.
- 3.10.6 Supervises day-to-day CCP CH Packaging activities.
- 3.10.7 Notifies the CCP WCS PM, WCS TR/Designee of any abnormal events associated with safe operation of CCP activities, for reporting purposes.
- 3.10.8 Provides oversight to WCS Operations personnel for payload and Overpack assembly.
- 3.10.9 Certifies payloads for transportation to and disposal at the WIPP.
- 3.10.10 Builds payloads from certified containers and overpacks provided by CCP WCOs in WWIS/WDS.
- 3.10.11 Builds shipments from approved payloads in WWIS/WDS.
- 3.10.12 Provides information and paperwork to WCS shippers for manifesting, marking, and labeling of TRUPACT/HalfPACT shipments to the WIPP.

- 3.10.13 Ensures Los Alamos National Laboratory (LANL) mobile loading unit personnel and WCS personnel are trained and qualified to perform WIPP-compliant CH TRU waste packaging and loading operations at the WCS prior to commencement of work activities.

4.0 INTERFACE

4.1 Training

- 4.1.1 CCP personnel or WCS personnel who perform work under CCP procedures will be trained to WIPP requirements according to CCP-QP-002, *CCP Training and Qualification Plan*.
- 4.1.2 Administrative work, such as Waste Acceptance Documentation reviews that require no access to WCS, may be completed by personnel who have not completed the WCS required site-specific training. Personnel who have not completed site-specific training will not be allowed unescorted access to the CH Packaging activities.
- 4.1.3 CCP and WCS personnel assigned to the field operations must complete the WCS site-specific training. The WCS TR will ensure that the WCS specific training documentation is sent to CCP. Training and notification is made to the CCP PM.
- 4.1.4 Both CCP training and WCS specific training must be completed prior to the individual being assigned to perform independent work at WCS. Training must be tracked according to respective training procedures.

4.2 Container Management

- 4.2.1 WCS is responsible for container movement, segregation, and storage.
- 4.2.2 WCS will provide the dose rate and surface contamination information necessary to maintain storage of certified TRU Waste container(s).
- 4.2.3 CCP will perform an on-site inventory review (monthly) according to CCP-TP-199, *CCP/WCS CH TRU Waste Inventory Control*.
- 4.2.4 The WCS TR/Designee is responsible for providing documented information to the CCP PM for any modification to container storage locations after initial storage.

4.3 Deficiencies and Nonconformances

4.3.1 CCP Identified Deficiencies and Nonconformances

NOTE

The CCP and WCS QA will confirm appropriate closure of the deficiencies that are resolved by CCP.

- [A] If CCP personnel identify a nonconformance condition associated with a waste container during the CCP CH Packaging process, CCP personnel will initiate an NCR in accordance with CCP-QP-005.
- [B] If the deficiency or nonconformance is resolved by CCP, CCP will ensure appropriate closure of the deficiency in accordance with CCP-QP-005.
- [C] If a container with an NCR is provided to WCS for storage, CCP will provide the NCR documentation to the WCS TR/Designee. These containers shall be segregated from non-NCR waste in the storage area consistent with DOE/WIPP QAPD. These containers will be managed in accordance with the WCS specific procedures and/or requirements. WCS will not remove the CCP hold tag unless directed to do so by appropriate CCP personnel (e.g., PM, TCO, QA).

4.3.2 WCS Identified Deficiencies and Nonconformances

- [A] Deficiencies or nonconformances identified by WCS during this project which affect stored TRU waste, or CH Packaging activities shall be promptly identified to the CCP PM, who will initiate an NCR or Issue Notice in accordance with applicable CCP procedures.
- [B] WCS will issue corrective action documentation in accordance with the WCS QA Program and Procedures.

4.4 Measuring and Test Equipment (M&TE)

- 4.4.1 CCP will maintain M&TE in accordance to CCP-QP-016, *CCP Control of Measuring and Testing Equipment*.

4.4.2 CCP will make calibration documentation and processes accessible, as needed, for internal audits, external audits and surveillances.

4.5 Work Standards

4.5.1 CCP Personnel will comply with the WCS Health and Safety Plan.

4.5.2 CCP Personnel will work under the WCS Lock-out/Tag-out procedure, if required.

4.5.3 CCP and WCS provided personnel will perform quality-affecting work under CCP procedures for CH Packaging activities. WCS procedures and/or work instructions will be used for non-waste activities (e.g., equipment repairs).

4.5.4 CCP operations personnel will operate in accordance with CCP-PO-005, *CCP Conduct of Operations*, and appropriate WCS formality of operations activities.

4.5.5 CCP operations personnel will comply with WCS procedures as they apply to CH Packaging and TRU waste storage areas.

4.5.6 CCP personnel will work under the WCS Health and Safety procedures and training requirements (e.g., General Employee Radiological Training [GERT]). Maintenance work control activities for CCP supplied equipment and WCS supplied equipment will be controlled using WCS procedures.

4.5.7 CCP personnel will participate in the WCS bioassay program, if required. CCP personnel will provide samples, as requested, under the routine/random program established by the WCS. CCP personnel will submit the bioassay samples required to establish a baseline for activities at WCS.

4.5.8 The CCP WCS PM will notify the WCS TR/Designee when new CCP personnel, NWP, and subcontractor personnel are assigned to work at WCS. The CCP WCS PM will notify the WCS TR/Designee when CCP personnel, NWP, and subcontractor personnel leave WCS as a result of reassignment or resignation. This notification will occur within three to five days. The WCS TR will notify affected WCS organizations to support the arrival or departure of CCP personnel.

- 4.5.9 The CCP WCS PM will be notified if any bioassay sample provided by CCP personnel indicates that an uptake of any radioactive isotopes may have occurred as soon as is reasonably possible.
- 4.5.10 WCS radiological controls personnel will perform routine surveys for contamination and radiation as specified in WCS policies or procedures. The CCP WCS PM and appropriate WCS management personnel will be notified immediately upon the discovery of any loose surface contamination in any CCP-occupied buildings, on any of the CCP CH Packaging equipment, on any stored TRU waste, or in buildings containing any Stored TRU waste. Access to and copies of routine survey results will be made available to CCP upon request.
- 4.5.11 WCS will immediately notify the CCP WCS PM of any abnormal continuous or fixed air sample filter analysis results from any area routinely occupied by CCP personnel.
- 4.5.12 CCP will provide historical information on the operation of any CCP equipment deployed at WCS for the purpose of lessons learned and the implementation of any mitigating actions from these lessons learned from other DOE sites that have CCP services performed.
- 4.5.13 For WCS supplied equipment and facilities, WCS is responsible for ensuring the safety basis is adequate to cover the equipment and facilities that are provided. For these instances WCS is the Design Authority. It is expected that CCP will participate in review of hazards analysis for equipment and facilities being provided.
- 4.5.14 For non-WCS provided equipment, CCP will provide safety basis input for the WCS safety basis review. CCP will be the Design Authority for the equipment. In addition, prior to any modification of equipment, these changes will be provided to WCS for review and incorporation into their safety basis documents and will be subject to CCP configuration management program. The programmatic limits for operation of the characterization equipment are the responsibility of CCP as part of their Design Authority responsibilities.
- 4.5.15 CCP personnel will work under the WCS 10 Code of Federal Regulations (CFR), Part 851, *Worker Safety and Health Program*, regulations and applicable procedures governing the WCS Health and Safety Plan.

4.5.16 CCP, through NWP established programs, will comply with the 10 CFR 851 requirements.

4.5.17 WCS and NWP Radiological Safety organizations can meet on a quarterly basis, or as necessary, to discuss the status of radiological conditions and work practices in areas routinely occupied by CCP personnel. This requirement may be met by NWP Radiological Safety personnel visiting WCS or by teleconference, as agreed to by these organizations. The NWP Radiological Safety Organization will provide the CCP Operations Manager and CCP WCS PM with a summary of the meeting including any issues that require resolution. This summary may be provided by e-mail.

4.6 Waste Certification and WWIS/WDS Data Entry

4.6.1 CCP will prepare Waste Stream Profile Forms (WSPFs) for TRU waste to be received and stored at WCS in accordance to WCS procedural requirements.

4.6.2 CCP will transmit characterization and certification data using the WWIS/WDS and procedure CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*.

4.6.3 CCP shall submit WSPFs to WCS for written concurrence/approval in accordance to WCS procedural requirements

4.6.4 The CCP WCO will document and certify that TRU waste payload containers meet the requirements of the WCS WAC and submit the data in accordance to WCS procedural requires for approval, prior to the release of each shipment.

4.6.5 CCP Transportation will begin their loading and shipping process using payload containers approved in WWIS/WDS.

4.7 CH Packaging

4.7.1 CCP will provide CH package loading equipment and personnel equipment (i.e. Adjustable Center-of-Gravity Lift Fixture [ACGLF]) and qualified personnel for payload assembly, and CH package loading/unloading.

4.7.2 WCS will provide hoisting and rigging equipment (i.e. crane, forklift) and trained personnel for support of container movement, payload assembly, and CH package loading/unloading.

- 4.7.3 CCP WCO will work with CCP TCO, as necessary, to complete the transportation process.
- 4.7.4 WCS Shipping will provide manifesting (loaded shipments) or Bill of Lading (empty shipments), marking, labeling, and placarding of shipments in accordance with 40 CFR and 49 CFR requirements and in accordance with site-specific procedures.
- 4.7.5 CCP will provide transportation certification documentation to the TR/Designee for waste shipped in accordance to CCP procedures.
- 4.8 Quality Assurance (QA)
 - 4.8.1 Activities performed in the completion of CH Packaging operations will be in compliance with applicable DOE-CBFO-certified CCP procedures and WCS procedures, as applicable.
 - 4.8.2 NWP will conduct periodic QA surveillances to assess compliance with applicable WIPP requirements.
 - 4.8.3 WCS will conduct audits/surveillances to assess compliance with applicable procedures.
- 4.9 Project Control
 - 4.9.1 CCP and WCS will provide weekly status updates for their respective scheduled activities.
 - 4.9.2 CCP will maintain and provide WCS with an up-to-date organization chart listing CCP personnel, along with associated roles and responsibilities.
- 4.10 Procedures
 - 4.10.1 As defined in CCP-QP-010, editorial or minor changes may be made to all CCP documents except CCP-PO-001, CCP-PO-002, CCP-PO-003, and CCP-QP-001, *CCP Graded Approach*, without the same level of review and approval as the original document. CCP will process any required changes to CCP procedures in accordance with CCP-QP-010 and will provide any minor or editorial changes to documents to the WCS TR/Designee as "Notify Only."

4.10.2 New Technical Operating Procedures (procedures that operate equipment) developed by CCP and scheduled to be used at WCS shall be evaluated by the WCS TR/Designee to determine if the procedure should be added to the WCS review and approval lists defined below.

4.10.3 The following documents, and revisions to these documents, will be provided to the WCS TR/Designee for review and approval as designated below unless categorically excluded by the WCS:

- CCP-CM-001, *CCP Equipment Change Authorization and Documentation*
- CCP-PO-026, *CCP Configuration Management*
- CCP-TP-054, *CCP Adjustable Center of Gravity Lift Fixture Preoperational Checks and Shutdown*
- CCP-TP-055, *CCP Varian Porta-Test Leak Detector Operations*
- CCP-TP-086, *CCP CH Packaging Payload Assembly*
- CCP-TP-140, *CCP Equipment Maintenance*
- CCP-TP-199, *CCP/WCS CH TRU Waste Inventory Control*

4.10.4 The following documents, revisions to these documents, and all minor changes to these documents will be provided to the WCS TR/Designee as "Notify Only" for review:

- CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- CCP-PO-003, *CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)*
- CCP-PO-005, *CCP Conduct of Operations*
- CCP-HSP-014, *Health and Safety Program Implementation for CCP*
- CCP-QP-001, *CCP Graded Approach*

- CCP-QP-002, *CCP Training and Qualification Plan*
- CCP-QP-005, *CCP TRU Nonconforming Item Reporting and Control*
- WP 15-GM1002, *Integrated Issues Management*
- CCP-QP-008, *CCP Records Management*
- CCP-QP-010, *CCP Document Preparation, Approval, and Control*
- CCP-QP-014, *CCP Quality Assurance Trend Analysis and Reporting*
- CCP-QP-015, *CCP Procurement*
- CCP-QP-016, *CCP Control of Measuring and Testing Equipment*
- CCP-QP-022, *CCP Software Quality Assurance Plan*
- CCP-QP-026, *CCP Inspection Control*
- CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*
- CCP-QP-030, *CCP Written Practice for the Qualification of CCP Helium Leak Detection Personnel*
- CCP-TP-027, *CCP Notifications for Intersite Shipment of Characterized CH TRU Waste*
- CCP-TP-030, *CCP CH TRU Waste Certification and WWIS/WDS Data Entry*
- CCP-TP-033, *CCP Shipping of CH TRU Waste*
- WP 15-GM.02, *Worker Safety and Health Program Description*

4.10.5 The following documents are controlled by DOE/CBFO and, upon CCP receiving notification of issuance/revision, CCP shall notify the WCS TR for purposes of review against applicable WCS permits and license requirements:

- DOE/WIPP 02-3183, *CH Packaging Program Guidance*
- DOE/WIPP 02-3184, *CH Packaging Operations Manual*
- DOE/WIPP 02-3185, *CH Packaging Maintenance Manual*
- DOE/WIPP 02-3220, *CH Packaging Operations for High Wattage Waste*

4.10.6 CCP will maintain control of procedures listed in Section 4.10.3 and 4.10.4 in accordance with CCP-QP-010.

4.10.7 WCS TR/Designee will review or designate the appropriate reviews of the CCP procedures listed in Section 4.10.3, and forward written comments to CCP Document Control per CCP-QP-010, for resolution.

4.10.8 The CCP PM will confirm that the WCS TR/Designee written comments are resolved with the WCS TR/Designee concurrence prior to proceeding with CCP operations.

4.11 Document Transmittals

4.11.1 Documents listed in Section 4.11, which are provided from one organization to the other as information copies, may be transmitted via memo, fax, e-mail, or formal correspondence. Documents identified as quality records will be transmitted via CCP-QP-008.

4.11.2 Documents to be provided to the WCS TR/Designee by CCP include:

- [A] Copies of NCRs and Issue Notices, at initiation and/or closure, as requested
- [B] Copies of QA surveillance reports
- [C] Copies of WSPFs
- [D] Information on chemical usage and copies of applicable MSDSs, as requested for inventory or reporting reasons

- [E] Copies of training requirements and associated training records for WCS personnel supporting CCP
- [F] CCP-PO-001, *CCP Transuranic Waste Characterization Quality Assurance Project Plan*
- [G] CCP-PO-002, *CCP Transuranic Waste Certification Plan*
- [H] Results of all DOE/CBFO/New Mexico Environment Department (NMED)/Department of Environmental Quality/U.S. Environmental Protection Agency (EPA) or other regulatory audit or compliance/enforcement actions that may impact its ability to transport or store TRU waste

4.11.3 Documents to be provided to CCP by WCS include:

- [A] Documentation of required training
- [B] Documentation of training completion for CCP personnel for training received from WCS
- [C] Radiological dose rate and surface contamination results on waste containers
- [D] Radiological information as described per Section 3.2.2[A] of this document
- [E] Copies of NCRs, deficiency reports, or other nonconformance documentation per Section 4.3
- [F] Copies of the results of WCS internal and external assessments and audits pertaining to CCP
- [G] Copies of calibration certifications, as requested
- [H] Copies of QA surveillance reports related to the CCP operations, if any
- [I] Results of Industrial Hygiene sampling activities to CCP by the WCS
- [J] Any documentation required for CCP to perform its scope of work, including correspondence pertaining to TRU waste storage and CH Packaging activities

4.12 Radioactive Material License and Configuration Management

- 4.12.1 WCS has primary responsibility to ensure that CCP equipment and processes have been appropriately considered within the WCS documented radioactive material license requirements.
- 4.12.2 WCS shall provide to CCP, WCS generated radioactive material license documentation concerning CCP related activities and equipment, for CCP's review.
- 4.12.3 CCP has primary responsibility to control operations and equipment configurations to ensure compliance with WCS procedures that protect the personnel, public, and environment.
- 4.12.4 For CCP-provided equipment, CCP will provide the documentation necessary for WCS to perform the evaluation against its radioactive materials license. This documentation may include health and safety plans, hazard assessments, system descriptions, equipment drawings, or other information deemed necessary through mutual agreement between CCP and WCS.
- 4.12.5 For WCS provided equipment, CCP will review operational license documentation, including evaluations, to ensure the safety of CCP personnel while operating the equipment.
- 4.12.6 All changes to equipment operated by WCS will be controlled by the WCS Configuration Management and Work Control processes to ensure appropriate license/engineering evaluations are conducted and associated controls are established.

4.13 Notification

- 4.13.1 WCS has primary responsibility to notify CCP when there are configuration changes in the facilities/areas sites used by CCP for TRU waste storage and CH Packaging activities.
- 4.13.2 WCS has primary responsibility to notify CCP when there are changes to the policies, licenses, processes, permits or procedures that may affect CCP activities or operations.
- 4.13.3 CCP has primary responsibility to ensure changes to equipment are in accordance with CCP-CM-001, *CCP Equipment Change Authorization and Documentation*.
- 4.13.4 CCP has primary responsibility to notify the WCS when there are configuration changes to CCP equipment.

4.13.5 WCS has primary responsibility to notify CCP prior to repairs or modifications to transportation trailers or packaging equipment (TRUPACT-II, HalfPACTs, etc.). NWP will then notify the appropriate NWP Cognizant Engineer. The Cognizant Engineer will verify/authorize the modification.

4.14 Procurement

4.14.1 Items and services to be purchased under CCP-PO-001, will be graded by CCP in accordance with CCP-QP-001 and coordinated with WCS. The grading will determine whether the items and services are quality-affecting (Quality Level 1 or Quality Level 2) or non-quality-affecting (Quality Level 0) for WIPP characterization, certification, and transportation. Procurements must be in compliance with WCS safety management requirements.

- [A] CCP, in coordination with WCS, will procure, receive, and inspect quality-affecting items and services in accordance with CCP-QP-015, *CCP Procurement*. These items and services are the sole responsibility of CCP with regard to their quality integrity. Additionally, CCP quality-affecting software shall be procured in accordance with CCP-QP-022.
- [B] CCP, in coordination with WCS, will procure non-quality-affecting items and services per CCP-QP-015, using a graded approach for WIPP certification, and CH Packaging.
- [C] Receipt inspection of quality-affecting items will be performed by personnel trained and qualified to CCP-QP-002.

4.15 Occurrence Reporting and Processing System (ORPS) and Price-Anderson Amendments Act (PAAA)

4.15.1 CCP, through NWP established programs, maintains the responsibility for reporting potential Price Anderson Amendments Act (PAAA) issues resulting from the certification and transportation of TRU waste by CCP at WCS. This includes filing any Occurrence Reporting and Processing System (ORPS) reports resulting from the certification or transportation of TRU waste by CCP at WCS.

4.15.2 CCP maintains the responsibility for reporting potential PAAA issues resulting from issues with safe operation of CCP CH Packaging activities based on WCS QA corrective action management system (e.g., Radiation Safety, IS&H, Industrial Hygiene, Maintenance, Lockout/Tagout, Conduct of Operations,

etc.) at WCS. CCP files any ORPS reports resulting from issues with safe operations of CCP characterization activities at WCS.

- 4.15.3 Both WCS and CCP reserve the right to file ORPS and PAAA reports, as they deem appropriate, upon coordination and consultation with one another concerning certification or safe operation of CH Packaging activities by CCP at WCS.
- 4.15.4 Both WCS and CCP shall invite the other to participate in the investigation of any CH Packaging event that results in an ORPS or PAAA report or required notifications.
- 4.15.5 Both WCS and CCP shall support and participate in investigations when CCP CH Packaging activities result in an ORPS or PAAA report.

5.0 RECORDS

- 5.1 Records generated during the performance of the CH Packaging are controlled by CCP.
- 5.2 QA records generated by CCP documents referenced in this plan are maintained in accordance with CCP-QP-008.
- 5.3 QA records generated by CCP will be maintained and dispositioned in accordance with CCP-QP-028, *CCP Records Filing, Inventorying, Scheduling, and Dispositioning*.

6.0 OVERSIGHT

6.1 WCS QA may conduct periodic surveillances to ensure CCP work is conducted in accordance with CCP procedures and WCS policies and procedures. These surveillances will be conducted in accordance with WCS QA procedures.

6.2 WCS QA will provide copies of its surveillance reports to the CCP PM. The CCP PM and NWP QA will take the following actions:

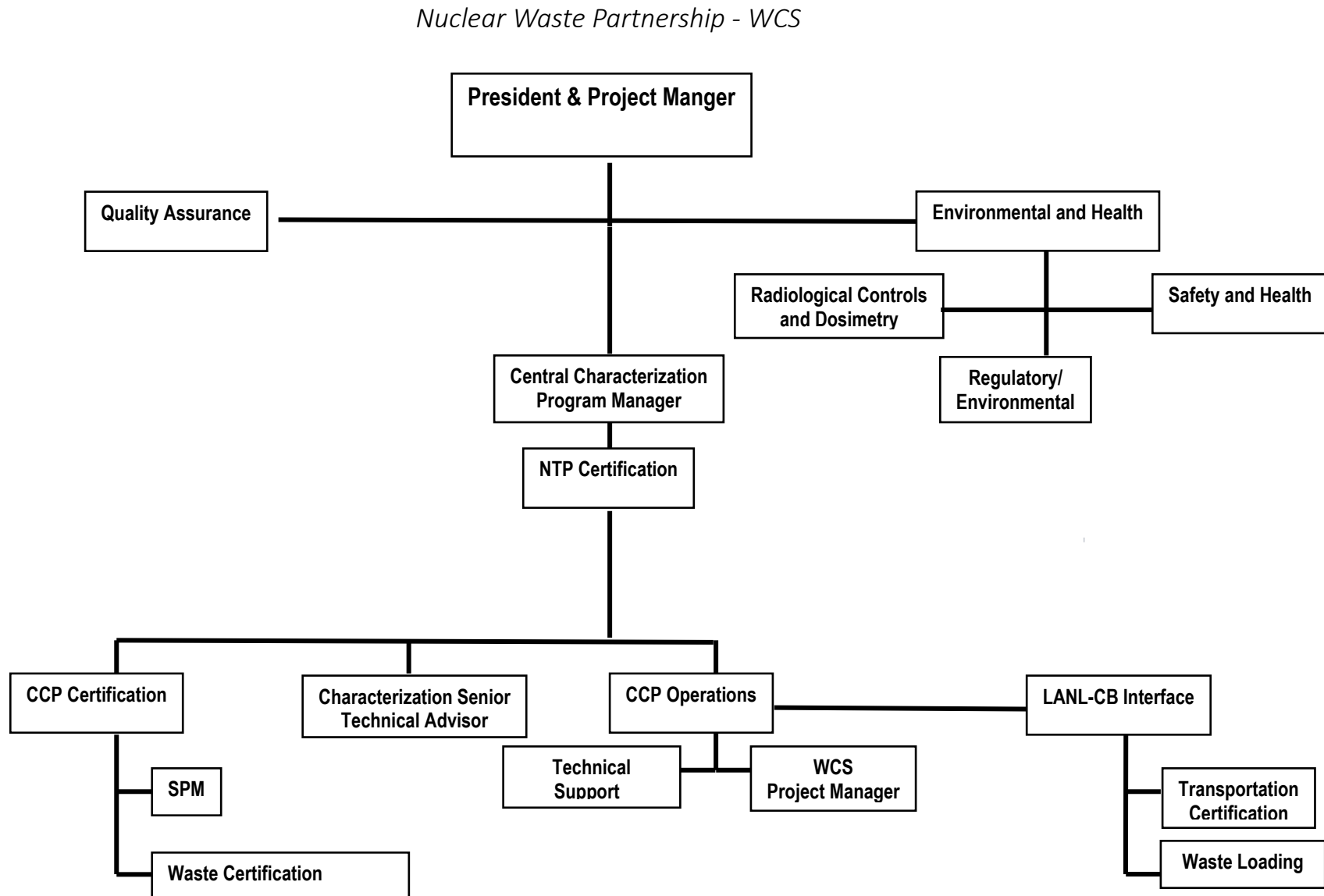
6.2.1 Review the WCS surveillance reports for any findings or other deficiencies against the CCP scope of work.

6.2.2 If required, prepare and process Issue Notices in accordance with WP 15-GM1002 for deficiencies identified during the review.

6.2.3 Provide WCS QA with CCP actions to correct the identified deficiencies, as documented in the Issue Notice.

6.2.4 QA will maintain an information file of the WCS surveillance reports conducted on the CCP scope of work.

Figure 1. Nuclear Waste Partnership - WCS



PRIORITY WIPP NAR/US 285 PROJECTS

Order of Priority

Route	Direction	Termini & Description	Project Scope	Approved Funding Amount
US 285	Both	MP 11.0 TO MP 21.50	3" Mill and Inlay	\$6,000,000
US 285	Both	MP 21.50 TO MP 27.8	Heater Scarification W/2.0" Overlay	\$4,500,000
US 285	Both	MP 35.0 TO MP 70.00 Varies Locations	Wearing Course Overlay	\$8,000,000
US 285	Both	MP 96.3 TO MP 105	3" Mill and Inlay	\$5,000,000
US 285	SBL"s	MP 146.0 TO MP 155.1	Heater Scarification W/2.0" Overlay	\$3,000,000
US 285	SBL"s	MP 163.0 - MP 174.0	HIR w/Nova Chip	\$2,500,000
US 285	NBL"s	MP 173.4 TO MP 204.5	HIR w/Nova Chip	\$6,500,000
US 285/US 60	Both	MP 256.7 to MP 263.5	Heater Scarification W/2.0" Overlay	\$5,000,000
				\$40,500,000

Note: preliminary estimates, project and project termini may need to be adjusted based on funding.

From: Andy Walker <andy.walker@cbfo.doe.gov>
Sent: Wednesday, September 6, 2017 1:01 PM
To: 'Padilla, Rick M., NMDOT' <Rick.Padilla@state.nm.us>
Cc: James Mason <James.Mason@cbfo.doe.gov>
Subject: RE: WIPP Priority Projects

Hey Rick,

I took the spreadsheet you guys sent us and simply rearranged them by mile marker south to north. The top projects on the attached are the lowest mile markers (furthest south) so I think we all agreed they were certainly considered SE NM. The highlighted ones are the ones I mentioned I would be good with. The estimated total cost for all the highlighted projects currently equals \$26.5 so if the estimates hold there would be ~\$300,000 of remaining funds.

I did not list which ones should be priority as you guys know much better than I which of the sections of road are in the most immediate need of repair. From our end I think as long as we concentrate on the SE NM roads we would be fine with that.

Thanks

Andy Walker
DOE/CBFO
Transportation Logistics Manager
Acting Director of NTP Operations Division
575-234-7407

From: Padilla, Rick M., NMDOT [<mailto:Rick.Padilla@state.nm.us>]
Sent: Wednesday, September 06, 2017 11:38 AM
To: Andy Walker <andy.walker@cbfo.doe.gov>
Subject: RE: WIPP Priority Projects

Andy can you provide me with the Projects your good with from our list?

Thanks,

*Rick Padilla, PE
State Maintenance Bureau*

Sent from my Verizon Wireless 4G LTE Droid

On Sep 5, 2017 1:03 PM, Andy Walker <andy.walker@cbfo.doe.gov> wrote:

Thanks Secretary Lujan,

We appreciate you and Rick taking the time to talk with us this morning.

In talking with some of our folks after the call there are a couple action items we just need to document to be in compliance with the final agreement. I have attached the language out of section 33 of the agreement below for reference. The items we need closure on are;

1. Please resubmit the prioritized list of projects in the order of priority as we discussed today with the SE NM projects listed first .
2. Please include a estimated schedule for each project completion, sorry I had forgotten to bring that up on the call today but was reminded later that DOE HQ has been asking about that.

We look forward to your upcoming visit and WIPP tour. Please let us know if you need anything from our end.

33. DOE shall pay to the New Mexico Department of Transportation ("NMDOT") \$34 million to fund necessary repairs to New Mexico roads used for the transportation of DOE shipments of transuranic waste to WIPP ("WIPP designated routes"), as specified at 18.20.9 NMAC, **in the southeastern portion of New Mexico.**

a) Monies will be used first to repave/repair the WIPP North Access Road, an approximately 13-mile stretch of road between Highway 62-180 and the WIPP site.

b) After providing for improvements of the WIPP North Access Road, NMDOT will prioritize such WIPP-designated routes for improvements to maximize safety, pavement condition and available funding. **NMDOT will provide a list of prioritized projects, including estimated total cost and schedule for completion to DOE prior to commencement of construction.**

c) DOE and NMED agree that NMDOT will act as project manager and fiscal agent for all projects contemplated in this paragraph, including planning, designing and obtaining rights-of-way for each project and securing all environmental clearances and approvals as required for federally-funded highway projects.

d) DOE shall remit funds to NMDOT provided that NMDOT: strictly accounts for all invoices and disbursements for the projects funded pursuant to this paragraph; provides detailed reports within ninety days of the completion of each project; maintains all records relative to the projects for a period of six (6) years; and, makes records reasonably available for inspection or audit by DOE at NMDOT offices in New Mexico.

e) DOE shall remit at least \$7.2 million of the funds in this paragraph to NMDOT by the end of federal fiscal year 2016; and shall remit the remainder of the funds to NMDOT by the end of federal fiscal year 2017. In no event shall DOE extend the time for providing all funding identified in paragraph 33 past the end of federal fiscal year 2017.

f) DOE shall complete all funding obligations contained in this paragraph by the end of federal fiscal year 2017 and submit a Certification of Completion following NMDOT's receipt of all the funds.

Thanks

Andy Walker

DOE/CBFO

Transportation Logistics Manager

Acting Director of NTP Operations Division

575-234-7407

From: Lujan, Anthony N., NMDOT [<mailto:Anthony.Lujan1@state.nm.us>]

Sent: Tuesday, September 05, 2017 11:59 AM

To: Andy Walker <andy.walker@cbfo.doe.gov>

Cc: Padilla, Rick M., NMDOT <Rick.Padilla@state.nm.us>; James Mason <James.Mason@cbfo.doe.gov>

Subject: RE: WIPP Priority Projects

Importance: High

Good day Mr. Walker,

The NMDOT received on Monday August 28, 2017 the amount of 26.8 million. If you have any other questions please advise.

Anthony Lujan
Deputy Secretary

