

Department of Energy
 Carlsbad Field Office
 P. O. Box 3090
 Carlsbad, New Mexico 88221
 March 4, 2004



Mr. Steve Warren, General Manager
 Westinghouse TRU Solutions
 P.O. Box 2078
 Carlsbad, NM 88331-2078



Subject: Transmittal of Audit Report for Audit A-04-13

Dear Mr. Warren:

The Carlsbad Field Office performed Audit A-04-13 of Washington TRU Solutions (WTS) on February 23-26, 2004. The audit resulted in two Corrective Action Reports 04-017 and 04-018, which has been issued separately, and two deficient conditions corrected during the audit (CDAs). The audit team concluded that the overall status of the WTS Quality Assurance Program is adequate, satisfactorily implemented, and effective. The details of the audit as well as conclusions are detailed within the enclosed audit report.

Should you have any questions concerning this audit, please contact me at (505) 234-7442.

Sincerely,

M. Lea Chism
 Quality Assurance Specialist

Enclosure

cc:w/enclosure
 A. Holland, CBFO *ED
 D. Miehl, CBFO *ED
 M. Navarrete, CBFO *ED
 M. Eagle, EPA *ED
 S. Zappe, NMED *ED
 B. Walker, EEG *ED
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 CBFO QA File
 CBFO M&RC





U.S. DEPARTMENT OF ENERGY
CARLSBAD AREA OFFICE

AUDIT REPORT

OF

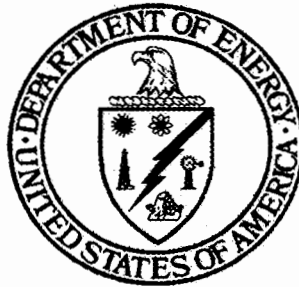
WASHINGTON TRU SOLUTIONS (WTS)

CARLSBAD, NEW MEXICO

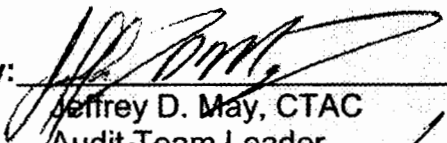
AUDIT NUMBER A-04-13

February 23 – 26, 2004

WTS QUALITY ASSURANCE PROGRAM



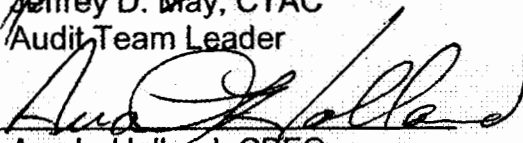
Prepared by:


Jeffrey D. May, CTAC
Audit Team Leader

Date:

3/4/04

Approved by:


Ava L. Holland, CBFO
Quality Assurance Manager

Date:

3/4/04

EXECUTIVE SUMMARY

Carlsbad Field Office (CBFO) Audit A-04-13 was conducted to evaluate Washington TRU Solutions (WTS) continued implementation of the quality assurance (QA) requirements defined in the CBFO Quality Assurance Program Document (QAPD), Sections 1.1, 1.3, 1.4, 1.5, 2.2, and 3.0, applicable Nuclear Quality Assurance (NQA)-1 elements, and applicable WTS implementing procedures. The audit was conducted at the WTS facility February 23 – 26, 2004.

The audit team concluded that overall, the WTS Quality Assurance procedures are adequate relative to the flow-down of requirements from the CBFO QAPD. The audit team also concluded that the CBFO quality requirements contained within the CBFO QAPD sections listed above are being satisfactorily implemented through the WTS Quality Assurance Program Description, and that WTS implementing procedures and processes are effective.

The audit team identified five concerns during the performance of the audit. As a result of these concerns, two conditions adverse to quality were identified and documented on corrective action reports (CARs). These CARs relate to Control of Nonconforming Items (quality improvement). Two isolated deficiencies that required only remedial corrective actions were determined to be corrected during the audit (CDA). One Recommendation was offered for management consideration.

SCOPE

The audit team evaluated the adequacy, implementation, and effectiveness of selected QA processes related to the WTS QA Program.

The following elements were evaluated in accordance with the CBFO QAPD:

- Organization
- Quality Assurance Program
- Design Control
- Document Control
- Control of Nonconforming Items (Quality Improvement)
- Corrective Action (Quality Improvement)
- QA Records
- Audits

The evaluation of the WTS QA documents for adequacy was based on the current revision of the CBFO QAPD, DOE/CBFO-94-1012.

AUDIT TEAM AND OBSERVERS

CAO AUDIT TEAM

Lea Chism	Management Representative, CBFO
Jeff May	Audit Team Leader, CBFO Technical Assistance Contractor (CTAC)
John Gray	Auditor, CTAC
Tammy Bowden	Auditor, CTAC

OBSERVERS/INSPECTORS

Ben Walker	Observer, Environmental Evaluation Group (EEG)
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AUDIT PARTICIPANTS

Individuals contacted during the audit are identified in Attachment 1. A pre-audit conference was held in the WTS Support Building Conference Room on February 23, 2004. A daily meeting was held with WTS management and staff to discuss issues and potential deficiencies. The audit was concluded with a post-audit conference held in the WTS Support Building conference room on February 26, 2004.

SUMMARY OF AUDIT RESULTS

Program Adequacy, Implementation, and Effectiveness

The audit team concluded that the WTS QA Program was adequate in meeting the requirements of the CBFO QAPD. The audit team also concluded that the selected QA Program elements are satisfactorily implemented and effective.

QA Program Audit Details

WTS implementing procedures included in the audit are identified in Attachment 2. Details of audit activities, including specific objective evidence reviewed, are contained in the audit checklists.

5.2.1 Organization and QA Program

WTS QA Program activities and organizational responsibilities were evaluated. The evaluation included the review of QA plans, procedures, audit and assessment schedules, and the corrective action process for compliance with the CBFO QAPD. This evaluation included a review of semi-annual trend reports, lessons learned documentation, Weekly Highlights reports, the Quality and Manufacturing Integrated Systems (Q&MIS), Determination of Quality Assurance Program controls documentation, and Computerized History and Maintenance Planning System (CHAMPS) work orders. The audit team evaluated the independence and authority of

WTS QA management through interviews, review of organization charts, management policies, and procedures. The audit team concluded that overall, the defined organization was adequate, satisfactorily implemented, and effective. With regard to the QA Program, the audit team concluded that overall, the program is adequate, satisfactorily implemented, and effective. One audit concern was identified within the QA Program. As a result of this concern, a Recommendation was offered to WTS management for consideration (Recommendation No. 1).

5.2.2 Quality Improvement

The WTS quality improvement processes, including corrective actions, non-conformances and deficiencies, performance trending, item hold tagging documentation, and issues management were evaluated. During this evaluation, objective evidence for disposition of nonconforming items, corrective action planning and follow-up, and improvement analysis of quality performance data were reviewed.

The issues management system is new (initiated February 2, 2004) and has so far been implemented without any major problems. The CAR system will be superseded by the issues management process upon closure of all existing CARs. The nonconformance report (NCR) system has not yet been incorporated into the issues management system.

Three concerns were documented in this area. The first concern pertained to the performance of quality affecting activities resulting from the use of the Event Documentation process without this process being documented in an approved WTS procedure. The second concern pertained to the use of an Event Documentation form to document an additional broken inner containment vessel (ICV) lock ring stop on TRUPACT-II 156. Upon notification of this issue, WTS Transportation Operations authorized unit 156 to be loaded and shipped with the damaged/missing lock ring stops via an e-mail attached to the Event Documentation form, without documenting and dispositioning the issue on an NCR. The third concern pertained to two NCRs out of 11 not having the quality level identified. Two of the concerns were determined to be conditions adverse to quality and were documented on CBFO CARs 04-017 and 04-018. One concern was corrected during the audit and found to be acceptable by the audit team by verification that the two NCRs were revised by making a proper correction of the record to add the quality level (CDA No. 1). Overall, the audit team determined that the control of nonconforming items and corrective action, (quality improvement), processes is adequate, satisfactorily implemented, and effective, except as described in CBFO CARs 04-017 and 04-018.

5.2.3 Documents

The audit team evaluated the document control process applied at WTS. The evaluation included reviews of procedures and objective evidence, and interviews with personnel from Document Services and the WTS QA group. The audit team verified that the preparation, issuance, and revision of documents are controlled to assure that correct documents are being used, and that documents, including changes, are

reviewed for adequacy and approved for release by authorized personnel. These items were verified in the Q&MIS and on hard copy. No concerns were identified during the audit. The WTS document control process was determined to be adequate, satisfactorily implemented, and effective.

5.2.4 Records

A review of records management activities was performed to verify adequacy, implementation, and effectiveness of the Records Program. The audit team evaluated the control of QA records for compliance with the requirements of the CBFO QAPD and WTS implementing procedures. Records management procedures were found to be adequate in addressing requirements in ASME-NQA-1, the CBFO QAPD, and the WTS QAPD. During the review of records management procedures for implementation and effectiveness, the audit team interviewed personnel and reviewed objective evidence to verify compliance. This evaluation included a review of the development, completion, and maintenance of organizational Records Inventory and Disposition Schedules (RIDS), record identification, and records storage. In addition, the auditors evaluated record receipt inspection, correction, and validation, and other associated activities performed by Project Records Services (PRS). The records personnel presented an overview of the records processes and walked the auditors through the Skeen-Whitlock facility and Records Holding Facility (RHF), explaining in detail each process function performed. All records evaluated by the auditors were complete and accurate. Security and records protection measures meet the CBFO QAPD requirements. The audit team verified that microfilm is inspected every two years for deterioration. One concern was identified during the audit regarding one Fire King file cabinet that was missing a controlled access list. This concern was corrected during the audit and the audit team verified that a new access list was placed on the file cabinet (CDA No. 2). The WTS QA records process has been determined to be adequate, satisfactorily implemented, and effective.

5.2.5 Design Control

The audit team evaluated the WTS design control program in relation to engineering and drafting processes and procedures. This evaluation included interviews with engineering personnel and review of procedures and design/engineering change orders for effective implementation. During this evaluation, work orders, design review documents, preventive maintenance documents, change orders, and documentation/approvals required to perform the various maintenance jobs were also reviewed with regard to their generation and approval. The audit team also evaluated the review processes, interfaces, and design verification for compliance with the CBFO QAPD and WTS implementing procedures. No concerns were identified in the design control area. Overall, the area of Design Control was determined to be adequate, satisfactorily implemented, and effective.

Audits

The audit team evaluated the WTS audit process including management assessments, independent assessments, and lead auditor qualifications. Management assessment documentation was reviewed and indicated that all major organizations of WTS scheduled and performed management assessments during calendar year 2003. Although report scope varied, most of the reports contained issues requiring attention, with the completed or intended actions noted. For consistency and guidance, the QA Manager distributes a Management Assessment Tool (MAT) to complement department and section management assessment criteria. A Management Assessment Annual Summary report was developed and submitted to the WTS General Manager. The QA Manager monitors corrective actions and issues closure. The audit team evaluated a sampling of completed audit plans and reports and completed surveillances identified on the independent assessment schedule and found them to be in compliance with the applicable requirements. The QA Manager provides a WIPP Quality Assurance Rolling Two-year Independent Assessment Schedule and tracks audits, audit criteria, and status on a Quality Assurance Fiscal Year Internal Audit Schedule. An evaluation of lead auditor training records indicated that the lead auditors are fully qualified and meet the CBFO QAPD requirements. No concerns were identified in the WTS audit process. Overall, the area of WTS audits was determined to be adequate, satisfactorily implemented, and effective.

CARs, CDAs, OBSERVATIONS, AND RECOMMENDATIONS

Corrective Action Reports

6.1.2 CARs Initiated as a Result of CBFO Audit A-04-13

The following CARs initiated as a result of Audit A-04-13 have been transmitted to WTS under separate cover. A brief description of each CAR is provided below.

6.1.2.1 CBFO CAR 04-017

An Event Documentation form for TRUPACT-II 156 was prepared to document an additional broken ICV lock ring stop, which was first documented on an e-mail from Rocky Flats Environmental Technology Site (RFETS) to WTS, and its reply, dated 12/13/03. The e-mail attached to the Event Documentation form indicated the deferred maintenance list showed one broken ICV lock ring stop. Upon notification of this issue, WTS Transportation Operations authorized RFETS to load and ship unit 156 with the damaged/missing lock ring stops; however, an NCR was not issued to document and control this nonconformance. As a result of the use of the Event Documentation form, WTS did not issue an NCR.

6.1.2.2 CBFO CAR 04-018

Quality affecting activities resulting from the use of the Event Documentation process are not documented in an approved WTS procedure.

Deficiencies Corrected During the Audit (CDA)

Two deficiencies, requiring remedial action only, were identified during the audit. Both were corrected before the completion of the audit. These CDAs are identified below, on the completed audit checklists, and documented on the Corrected During the Audit forms, which are maintained as CBFO QA records.

6.2.1 CDA No. 1

Two NCRs out of 11 did not have the quality level identified (NCRs 04-10 and 04-11 same originator). The NCR coordinator also overlooked the missing quality level on these NCRs.

WTS revised NCRs 04-10 and 04-11 by properly correcting the record to add the quality level. These revised NCRs were reviewed and found to be acceptably corrected.

6.2.2 CDA No. 2

Fire King cabinet # 3 was missing a list designating personnel who are permitted access to the QA records.

The audit team verified through observation that a new access list was placed on the file cabinet # 3. This was found to be acceptably corrected during the audit.

Observations

The audit team noted no Observations during this audit.

Recommendations

The following Recommendation was presented for WTS management consideration:

6.4.1 Recommendation No. 1

CBFO QAPD contains requirements relating to peer reviews. WTS does not perform peer reviews as part of their work-scope, however, it is recommended that the WTS QAPD be revised to include a statement under a section that corresponds to the CBFO QAPD section stating that peer reviews are not performed under the WTS work-scope.

7.0 LIST OF ATTACHMENTS

- Attachment 1: Personnel Contacted During the Audit
- Attachment 2: WTS Implementing Procedures
- Attachment 3: Summary Table of Audit Results

PERSONNEL CONTACTED DURING THE AUDIT

WTS PERSONNEL CONTACTED

NAME	ORGANIZATION	PREAUDIT MEETING	CONTACTED DURING AUDIT	POST AUDIT MEETING
Allen, Bill	WTS Senior Tech Coordinator/QA	X	X	X
Allen, James	QA Specialist		X	
Anderson, Beck	QA Specialist	X	X	
Anderson, James	QA Specialist	X		
Anderson, Scott	Ops Mgr.	X		X
Ater, Ed	Mgr. Oversight Programs	X	X	
Brooks, Susan	WTS Ops/ Asst. Eng.		X	
Bostick, Leroy	WTS Mgr Surface Ops & Maint.	X		X
Brown, Brandye	QA.WTS Admin	X		
Cassingham, Bertha	QA Analyst	X		
Cullum, Bob	WTS Mgr CM	X	X	
Fox, Michael	PRS Mgr	X	X	
Jon Hoff	Mgr. Assurance Programs	X	X	X
Keathley, Martin	QA Specialist		X	
Lipscomb, Michael	WTS QA Mgr.	X	X	X
Mireles, Jessica	QA/WTS Admin	X	X	
Morrison, Rob	WTS/Trans Ops Eng			X
Morrison, Gary	Mgr/BOP & Design Eng	X		X
Mullins, Mary Ann	QA Staff Assistant		X	
Preciado, Ernest	Waste Ops Mgr/CBFO			X
H. F. Scheel	WTS/Trans Ops Eng.			X
Simmons, Craig	L&M Doc Services		X	

PERSONNEL CONTACTED DURING THE AUDIT

WTS PERSONNEL CONTACTED

NAME	ORGANIZATION	PREAUDIT MEETING	CONTACTED DURING AUDIT	POST AUDIT MEETING
Treadway, Wayne	WTS Eng.		X	
Wiedenhoeft, Dave	QA Specialist	X		
Will, Lisa	EOS			X
Youngerman, Steve	WTS Dep. Ops Mgr.	X		X

WTS Implementing Procedures	
Activities	Applicable WTS Documents
Quality Assurance Program and Organization	WP13-1/ 24, <i>Quality Assurance Program Description</i> WP 13-QA.04/11, <i>Quality Assurance Department Administrative Program</i> 13-QA3005/9, <i>Graded Approach to Application of QA Requirements</i>
Control of Nonconforming items and Corrective Action (Quality Improvement)	13-QA3003/9, <i>Corrective Action Program</i> 13-QA3004/4, <i>Nonconformance Report</i> 13-QA3001/5 <i>Issuing Hold Tags</i> 13-QA-3006/4 <i>Performance Trending</i>
Document Control	15-PS3002/14, <i>WTS Controlled Document Processing</i> 15-PS.2/1, <i>Procedure Writers Guide</i> 15-PS3103/8, <i>Document Distribution</i> 15-PS3006/4, <i>Processing WTS Forms and Electronic Attachments</i>
QA Records	15-PR/6, <i>WIPP Record Management Program</i> 15-PR3002/2, <i>Records Filing, Inventorying, Scheduling, and Dispositioning</i> 15-PR3003/3, <i>Disposal of Nonpermanent Records</i> 15-PR3005/4, <i>Records Transfer and Retrieval</i> 15-PR3007/3, <i>Receipt of Records Boxes at the CBFO Records Holding Facility</i> 15-PR3011/3, <i>Retrieval of Records from the CBFO Records Holding Facility</i> 15-PR3006/2, <i>Records Inventory and Disposition Schedule Review and Approval</i> 15-PR3013/3, <i>Destruction of Nonpermanent Records</i>
Design Control	WP-09/16, <i>Engineering Conduct of Operations</i> 09-CN3007/16, <i>Engineering and Design Document Preparation and Change Control</i> 09-CN3018/7, <i>Design Verification</i> 09-CN3023/2, <i>Functional Classification Determination for Design</i> 09-CN3021/6, <i>Component Indices</i> 09-CN3022/6, <i>Engineering File Room Operations</i> 09-CN3024/7, <i>Configuration Management Board/Engineering Change Proposal</i> 09-CN3025/0, <i>Annual System Walkdown</i> 09-CN3031/2, <i>Engineering Calculations</i> 09-CN3034/2, <i>Configuration Management Determination</i> 09-SU.01/4, <i>WIPP Start-Up Test Program</i>
Audits	WP 13-QA.03/9, <i>Quality Assurance Independent Assessment Program</i> WP 13.04/11, <i>Quality Assurance Department Administrative Program</i> WP 13.07/5, <i>Integrated Self-Assessment system Implementation Plan</i> WP 13.08/4, <i>Management Assessment Program</i>

Summary Table of Audit Results

Audit Elements	Concern Classification				QA Evaluation		
	CARs	CDAs	Obs	Rec	Adequacy	Implementation	Effectiveness
Activity							
Organization & QA Program				1	A	S	E
Control of Nonconforming Items and Corrective Action (Quality Improvement)	04-017 04-018	1			A	S	E
Document Control					A	S	E
QA Records		2			A	S	E
Design Control					A	S	E
TOTALS	2	2	0	1	A	S	E

Definitions

E = Effective
 S = Satisfactory
 I = Indeterminate
 M = Marginal

CAR = Corrective Action Report
 CDA = Corrected During Audit
 NE = Not Effective

Obs = Observation
 Rec = Recommendation
 A = Adequate
 NA = Not Adequate