



QA: QA

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**BECHTEL SAIC COMPANY, LLC (BSC) QUALITY ASSURANCE (QA) SUPPLIER
AUDIT REPORT BSC-SA-02-019 OF PRIMARY STANDARDS LABORATORY**

Enclosed is the Supplier Audit Report BSC-SA-02-019 of Primary Standards Laboratory (PSL) in Albuquerque, New Mexico performed on March 26-27, 2002. The audit evaluated the implementation and effectiveness of the Quality Program in meeting the requirements of the BSC procurement documents.

The audit revealed effective implementation of PSL's Quality Program with the exception of four conditions adverse to quality in the areas of Procurement Document Control, Audits, and Software. The conditions adverse to quality are documented in Deficiency Reports (DRs) BSC(V)-02-D-101, -102 and -103. One condition adverse to quality was identified on Quality Observation BSC(V)-02-O-003 in the area of Document Control.

As a result of the audit, PSL will remain on the Office of Civilian Radioactive Waste Management Qualified Suppliers List. PSL will be placed on an annual audit schedule for calibration services with the restriction that no procurements can be placed with PSL until closure of the DRs. Additional audits or surveillances prior to the next scheduled audit may be performed upon closure of the DRs.

This audit is considered complete and closed as of the date of this letter.

If you have any questions, please contact either Robert D. Habbe at (702) 295-1631 or Daniel A. Klimas at (702) 295-2665.

A handwritten signature in black ink, appearing to read 'D. T. Krisha'.

Donald T. Krisha, Manager
Quality Assurance

4/26/02
Date Signed

RDH:bw-0426022423

Enclosure:
Supplier Audit Report BSC-SA-02-019

Handwritten initials in the bottom right corner, possibly 'DK' or 'RH'.

April 26, 2002
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cc w/encl:

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**BECHTEL SAIC COMPANY, LLC (BSC)
QUALITY ASSURANCE (QA)
SUPPLIER AUDIT REPORT**

QA:QA

1. **SUPPLIER AUDIT NUMBER:** BSC-SA-02-019
2. **DATES PERFORMED:** March 26-27, 2002
3. **SUPPLIER NAME:** Primary Standards Laboratory (PSL)
Sandia National Laboratories (SNL)
4. **SUPPLIER LOCATION:** Albuquerque, New Mexico
5. **SERVICES/ITEMS PROVIDED:** Calibration of physical, electrical, pressure, mechanical, and measurement equipment.
6. **AUDIT SCOPE/TYPE:** Triennial Audit
7. **QA PROGRAM ELEMENTS EVALUATED:** Organization, Quality Assurance Program, Procurement Document Control, Implementing Documents, Document Control, Control of Purchased Items and Services, Control of Measuring and Test Equipment, Corrective Action, QA Records, Audits, and Software.
8. **SUPPLIER QUALITY PROGRAM DOCUMENT AND REVISION AUDITED:**
Measurement Standards Program (MSP), Operations & Procedures (O&P) Document No. 3.5.1, Revision 8
9. **BSC APPLICABLE PROCUREMENT DOCUMENTS:**
BSC Memorandum Purchase Order B001897CC2X
10. **AUDIT TEAM MEMBERS:**
LEAD: Robert D. Habbe, BSC QA
MEMBERS: John E. Timmons, BSC QA
11. **OBSERVERS:** None
12. **PERSONNEL CONTACTED DURING AUDIT:**
Richard Pettit, QA Manager
Larry Azevado, Metrology Manager
Mary Woodruff, Quality Coordinator
Leonard Duda, Microwave Project
David Sanchez, Metrologist

13. OVERALL EFFECTIVENESS OF THE SUPPLIERS QA PROGRAM IMPLEMENTATION:

SATISFACTORY X UNSATISFACTORY

IF CONSIDERED UNSATISFACTORY –DESCRIBE QA ELEMENT AND CAUSE: N/A

14. FOLLOW-UP REQUIRED:

 NO FOLLOW-UP AUDIT OR SURVEILLANCE REQUIRED

 SURVEILLANCE

 FOLLOW-UP AUDIT

 X DETERMINATION BASED ON IMPACT WHEN CAR/DR CLOSED

FOLLOW-UP ACTION TRACKED ON SUPPLIER EVALUATION REPORT (SER) OR QUALIFIED
SUPPLIERS LIST (QSL) OPEN ITEM LIST

15. SUPPLIER STATUS:

AUDIT SCHEDULE

 REMAIN ON QSL WITH TRIENNIAL AUDIT SCHEDULE

 X REMAIN ON QSL WITH ANNUAL AUDIT SCHEDULE

RESTRICTIONS

 NONE X YES

IF YES – RESTRICTION IS: No procurements will be placed with PSL until closure of the
Deficiency Reports BSC(V)-02-D-101, -102, and -103.

Audits or surveillances prior to the next scheduled audit may be performed based on QA
program changes, scope of work changes, and/or supplier performance as deemed
necessary.

16. AUDIT DETAILS:

Details of the audit, along with the objective evidence reviewed, are contained within the
audit checklist, which is available from the BSC Records Processing Center.

17. **AUDIT FINDINGS:**

TOTAL CONDITIONS ADVERSE TO QUALITY: Four

CONDITION ADVERSE TO QUALITY BRIEF DESCRIPTION:

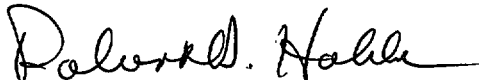
Document Type and Number	Description
Quality Observation BSC(V)-02-O-003	Two procedures (DC-TE-G6500, Version A1 and DC-TE-G9520, Version A1) were not identified with the revision identification (Version A1) as required by the PSL Operations and Procedure (O&P) 5.2.2.1, Section 6.1.1, Revision 4. PSL prepared their Corrective Action Report number 136 to document this Condition Adverse to Quality (CAQ).
Deficiency Report BSC(V)-02-D-101	A. MSP O&P Document 5.8.4.1, Section 6.1.2 states: "The audit team uses the MSP checklist contained in O&P 5.8.4.2 as the guiding document for the internal audit. This checklist is derived from the ANSI Z540-1 and NIST Handbook 150 documents. Sections 4.0, 5.0 and 6.0 of the checklist are not reviewed with the project groups. Observations or comments on each evaluation factor are recorded on the checklist and objective evidence is noted." B. MSP O&P Document 5.8.4.1, Section 6.2 states: "The review of the MSP quality system includes those factors affecting the operation of the entire program and not limited to individual project groups. In addition, the following items from the MSP checklist contained in O&P 5.8.4.2 are reviewed: Section 4.0 Organization and Management, 5.0 Quality System Audit and Review, and 6.0 Personnel." C. MSP O&P Document 5.8.4.1, Section 6.3 states: "The programmatic review of the overall quality system is documented in a report that summarizes the findings of the review." D. MSP O&P Document 3.5.1, Section 3.3. states: "MSP management appoints a Lead Auditor who directs the audit team. The team members are qualified as technical auditors according to the training and certification program documented in O&P Manual 6.2.1." Contrary to the requirements: A. Several of the questions in Section 5.0 of the checklist have been evaluated during the internal audits of the project groups. The annual internal audit checklists for Fiscal Year (FY) 2001 of the 9 project group audits did not have objective evidence noted in the checklists. B. Several of the questions in Sections 4.0, 5.0 and 6.0 of the checklist for the FY 2001 internal audit (QA01-00) were not evaluated. Additionally, Sections 14, Sub-contracting of calibration, and Section 15, Outside support services and supplies that affect calibration results, were not evaluated during the FY 00 (QA00-0), FY 01 (QA01-00) or FY 02 (QA02-00) Quality System Internal Audits. C. No reports have been issued for the FY 00 (QA00-0), FY 01 (QA01-00) or FY 02 (QA02-00) Quality System Internal Audits.

Document Type and Number	Description
Deficiency Report BSC(V)-02-D-102	<p>D. PSL could not provide any objective evidence that Len Duda and Mary Woodruff are qualified as lead or technical auditors. Both have performed internal audits of PSL.</p> <p>A. TRW Purchase Order A06649ME9X, Change Notice 9, Work Package 11017040M2, Procurement Requirements Document of Q Calibration Services for HY-CAL Engineering Dew Point Transmitter Model No. CT-890-A, Rev 00, Attachment I, Section 3.0 states: "The approach used to assure that technical and quality requirements are incorporated into procurement documents and changes to the documents shall be described."</p> <p>Contrary to the requirements:</p> <p>A. The PSL quality program does not require technical and quality requirements to be incorporated into calibration services procurements. Additionally, the PSL quality program does not require a documented review and approval of the procurement documents for calibration services. Calibration services are normally procured by credit card.</p>
Deficiency Report BSC(V)-02-D-103	<p>A. MSP O&P Document 3.6.1, Section 6.3.1 states: "For Software in appropriate categories (Appendix A), a software summary form should be prepared."</p> <p>B. TRW Purchase Order A06649ME9X, Change Notice 9, Work Package 11017040M2, Procurement Requirements Document of Q Calibration Services for HY-CAL Engineering Dew Point Transmitter Model No. CT-890-A, Rev. 00, Section IV, SOFTWARE states: "Where software is used in a process which provides results that are not later validated, PSL shall identify the software version and describe the method or approach used to test the software to a known benchmark to verify that the software is functioning properly and produces the intended results. Software version changes shall be checked to verify that the software produces correct results."</p> <p>Contrary to the requirements:</p> <p>A. PSL did not complete a software summary form to document the changes of the CERTVANA software for Versions B7, B8, and B9. CERTVANA versions B0 through B6 have the software summary forms completed documenting the software changes.</p> <p>B. PSL could not provide any objective evidence of validation/verification/checking of the CERTVANA software for Versions B7, B8, and B9. CERTVANA versions B0 through B6 have documentation supporting the validation/verification of the changes to the software.</p>


TOTAL RECOMMENDATIONS FOR IMPROVEMENT: None

RECOMMENDATIONS FOR IMPROVEMENT BRIEF DESCRIPTION: N/A

This audit is considered closed.

Prepared by: 
Robert D. Habbe
Audit Team Leader
BSC Quality Assurance

Date: 4-24-02

Approved by: 
Donald T. Krisha, Manager
BSC Quality Assurance

Date: 4/26/02