INSPECTION PROCEDURE 35752

PART 52 - PROCUREMENT CONTROL & RECEIPT, STORAGE AND HANDLING OF EQUIPMENT AND MATERIALS

PROGRAM APPLICABILITY: 2504

35752-01 INSPECTION OBJECTIVES

01.01 Verify that the COL holder has developed and implemented a quality assurance (QA) program relating to the control of procurement activities that is in conformance with the NRC approved Quality Assurance Program Description (QAPD)

01.02 Verify that the COL holder has developed and implemented a QA program relating to the control of receipt, storage and handling of equipment and materials that is in conformance with the QAPD.

35752-02 INSPECTION REQUIREMENTS & GUIDANCE

02.01 Procurement.

a. Background. The inspection in this area should be directed at assuring that procurement of equipment and materials and selection of suppliers will be accomplished in accordance with the COL holder's documented controls. The COL holder may define two type of procurement controls; one for purchase of non-safety related items and one for safety related items. If this is the case, it is important to recognize that the defined methods of control must be sufficiently definitive to prevent the non-conservative method of controls from being used for purchasing safety related items. The COL holder may have established defined channels for developing and approving procurement documents for major equipment but may also allow for direct procurement by onsite supervision or other personnel. For example, onsite personnel may, in some cases, be assigned the responsibility or be permitted to directly purchase expendable supplies and materials, such as chemical, boron, lubricants, solvents, bar and plate stock, welding rod, etc. If this practice is permitted, the COL holder's procedures should also define how these procurement activities will be controlled.

When documentation in the form of certification is used at the site in lieu of original records establishing quality of materials or components important to safety, the following guidelines should be used:

1. The certification should specifically identify the purchased material or equipment, such as by the purchase order number.

2. The certification should identify the specific procurement requirements met by the purchased material or equipment, such as codes, standards, and other specifications. This may be accomplished by including a list of the specific requirements or by providing onsite, a copy of the purchase order and procurement specifications or drawings, together with a suitable conformance statement. The procurement requirements identified should include any approved changes, waivers, or deviations applicable to the subject material or equipment.

3. The certification should identify any procurement requirements which have not been met, together with an explanation and the means used to resolve the nonconformances.

4. The certification should be attested to by a person who is responsible for this QA function and whose function and position are described in the purchaser's or supplier's QA program.

5. The certification system, including the procedures to be followed in filling out a certificate and the administrative procedures for review and approval of the certificates, should be described in the purchaser's or supplier's QA program.

6. Means should be provided by the COL holder to verify the validity of certificates, and to determine the effectiveness of the certification system when desired, such as during the performance of audits.

7. Typical certifications are manufacturer's certifications that a product (usually consumables, such as weld rod and fly ash) if tested, would exhibit the product characteristics shown on the certification document. Typical certifications are acceptable only if the user can demonstrate that the product was manufactured under a process control system which provides for product control and process records that establish the product was manufactured within the characteristic limits identified on the certification.

Review and approval of changes to procurement documents should be by the same individual/organization that approved the original document unless another qualified organization is formally designated.

Selection and qualification methods should be described in the QAPD and key features of these defined controls should be reviewed. Requirements should also be established in the QAPD for documenting the measures, checks, etc., used to qualify each vendor, supplier, or contractor.

The COL holder should have a supplier surveillance program to verify conformance of procured services to procedures, drawings, specifications, procurement documents and other specified requirements. The COL holder should also have responsibilities assigned to assure that surveillance activities when required, will be accomplished by authorized personnel assigned to check, inspect, audit, or witness the activities of supplier's furnishing services.

Approval and qualification of bidders is generally an off-site function and is generally accomplished by a branch of corporate engineering or purchasing. Procedures relating to the selection and audit of suppliers may be held by the corporate office.

Procurement documents may contain some of or all of the requirements identified in section 02.01.b, depending on the item or service procured.

Criterion IV of Appendix B to 10 CFR 50, requires, in part, that "To the extent necessary, procurement documents shall require contractors or subcontractors to provide a QA program ..." In some cases, judgment of "to the extent necessary" is required. For example, specific test or packaging requirements may not be necessarily included in the procurement document if none are required for the item in question.

Approved bidders lists may be maintained by the corporate office. The inspector may need to have the COL holder transmit these to the site or make an inspection trip to the corporate office to satisfy this item.

Results of supplier audit or evaluation will probably not be on-site, requiring arrangements with the corporate office.

Quality documentation would not be required for catalogue or off-the-shelf items such as light bulbs, resistors, and gaskets.

b. Requirements.

1. Verify that administrative controls require that procurement documents provide the following for safety-related items.

   (a) Technical, regulatory, administrative, and reporting requirements (such as specifications, codes, standards, tests, inspections, special processes, and 10 CFR Part 21 and 10 CFR 50.55(e) are invoked as necessary for procurement items and services.

   (b) Specific identification of equipment, supplies, consumables (chemicals, welding rods, etc,) or services purchased.

   (c) Identify any test, inspection, and acceptance requirements and any special instructions for fabrication, packaging, shipping or storage.

   (d) Access to the supplier's plant or records for purposes of audit.

   (e) Documentation to certify the item being procured.

   (f) Requirement for the contractor/supplier to provide a QA program consistent with Appendix B to 10 CFR 50.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

2. Verify that administrative controls provide measures and assign responsibilities in writing for:

   (a) Initiation of procurement documents

   (b) Review and approval of specifications differing from the original design documents

   (c) Review and approval of procurement documents

   (d) Making changes to procurement documents

(e) Basis for designation of quality classification of procurement items

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

3. Verify that administrative controls provide the following concerning bidders/ suppliers:

   (a) An acceptable method was implemented for "qualifying" a vendor, supplier, or contractor providing goods or services.

   (b) Provision for purchaser's right of access to supplier's facilities and documents.

   (c) Maintenance of an "approved bidders" list, including methods for updating the list.

   (d) Maintenance of records of supplier qualification and audit.

   (e) Requirements for approval of supplier special processes such as welding, nondestructive examination, heat treatment, coating, and plating.

   (f) Responsibilities are assigned for items (a) through (e), above.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

4. Verify the following for procured items:

   (a) Procurement documents were prepared in accordance with administrative controls identified in 02.01.b.1 and 02.01.b.2

   (b) The items were purchased from "qualified" vendors.

   (c) The procurement documents contained requirements for the vendor/ supplier to supply appropriate documentation of quality, including component traceability.

Specific Guidance. Review a sample of six recently purchased safety related and risk significant non safety-related items that have been received on-site. No more than two should be from any one of the following categories; mechanical, electrical, instrument/electronic, and consumables (chemicals, reagents, lubricants, filters, etc.).

5. Verify that the completion of the most recent supplier audit or evaluation.

Specific Guidance. Review the results of the most recent supplier audit or evaluation have been maintained as in records as required by the QAPD.

6. Verify personnel are cognizant of QA program requirements.

Specific Guidance. Interview a sample of four personnel assigning/designating quality classification to verify that they are cognizant of QA program requirements.

7. Verify that an approved bidders list is maintained in accordance with administrative controls.

Specific Guidance. Review the approved bidders list and confirm it is maintained in accordance with the controls identified in 02.01.b.3.(c).

02.02 Receipt, Storage, and Handling of Equipment and Materials

a. Background. Receipt inspections are inspections by the purchaser to determine the conformance of materials and supplies to predetermined quality requirements. Items normally considered during receipt inspection may include cleanliness, dimensional, chemical and physical tests, and functional tests, depending upon the extent of source surveillance and inspections performed.

It should be noted that all safety related and risk significant non-safety related materials and supplies are not necessarily received and stored onsite. Rather, they may be received and stored in a warehouse, etc., near the site. The inspector should therefore, verify that the COL holder's receipt inspection program covers offsite as well as onsite deliveries of safety related material and supplies.

The inspector should find written receipt inspection requirements which specifically address those materials, components, and spare parts associated with safety related and risk significant non-safety related items, e.g., the reactor coolant pressure boundary. It is quite likely items such as resins, boron, spare parts, etc., are being received at this time and it is appropriate to verify that the formal receipt inspection program applicable to these items is being followed by receipt inspectors.

Review the measures to control nonconforming equipment and materials to prevent their inadvertent use or installation.

During the review of the requirements established for the disposition of safety related and risk significant non-safety related nonconforming items, the inspector should find provisions to assure that: (1) nonconforming items will be reviewed and then accepted, rejected, repaired or reworked in accordance with documented procedures; (2) repaired and reworked items will be reinspected in accordance with applicable procedures; (3) a description of the change, waiver, or deviation that has been accepted for "use as is" items will be documented; and (4) the responsibility and authority for the disposition of nonconforming items will be clearly defined in writing.

It is extremely important that nonconforming safety related and risk significant non-safety related items are properly controlled to prevent their inadvertent use or installation.

Special storage environments include such things as inert gas atmosphere, specific moisture content levels, temperature levels, etc. During the review of environmental controls, verify that the COL holder has established a requirement for periodically inspecting items stored in special environments to assure that the controlled conditions will be maintained.

Special handling is sometimes required because of the weight, size, susceptibility to shock damage, etc., of certain items. The COL holder should therefore, have controls established that provide for special handling as well as for the routine handling of materials and equipment.

b. Specific Requirements.

1. Verify the establishment of the following administrative controls for receipt of safety related items are in accordance with the QAPD.

   (a) Written requirements for conducting receipt inspections of all incoming safety-related materials and supplies.

   (b) Requirements for receipt inspection for shipping damage.

   (c) Requirement that materials and supplies will be examined for conformance with requirements specified on the original procurement document.

   (d) Requirement that documentation of the receipt inspection be prepared and retained.

   (e) Responsibilities are assigned in writing for items (a)-(d) above.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

2. Verify the establishment of the following administrative controls for the disposition of items received on site:

   (a) Controls for Acceptable items including:

      (1) Tagging/marking for storage.

      (2) Immediate issue for use.

   (b) Controls for Nonconforming items including:

      (1) Requirements have been established for marking and segregating nonconforming items.

      (2) Requirements have been established for the disposition of nonconforming items.

      (3) Requirements have been established to prohibit the use of equipment or materials in "nonconformance" status.

      (4) Provisions have been made for notifying affected organizations of nonconforming items.

      (5) Requirements have been established for the documentation of nonconforming items.

   (c) Controls for Conditional Release items including:

      (1) Justification for use

      (2) Documentation required

      (3) Authority for conditional release of item

(d) Responsibilities are assigned in writing for items (a) - (c), above.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

3. Verify the establishment of the following administrative controls for (on or offsite) storage of safety related and risk significant non-safety related items:

   (a) Written requirements have been issued providing for levels of storage and appropriate environmental conditions.

   (b) Storage controls including access, identification of items, coverings, and preservatives are specified.

   (c) Requirement to conduct periodic inspections of the storage area.

   (d) Maintenance and care of items in storage is specified including shelf life.

   (e) Responsibilities assigned for implementation of storage controls identified in (a) - (d), above.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

4. Verify the establishment of the following controls for handling a safety-related material:

   (a) Routine and special handling measures are specified.

   (b) Hoisting equipment controls are established.

   (c) Responsibilities assigned to assure that the handling controls identified in items (a) and (b), above will be implemented.

Specific Guidance. Review applicable section(s) of the QAPD and any associated lower tier procedures for a description of the administrative controls listed above.

5. Verify the following:

   (a) Receipt inspections were conducted in accordance with administrative controls identified in 02.02.b(1).

   (b) Disposition of the items was in accordance with controls identified in 02.02.b(2).

   (c) Storage of the items was in accordance with 02.02.b(3).

Specific Guidance. Review a sample of four - five recently purchased safety related and risk significant non-safety related items that have been received on-site. No more than two should be from any one of the following categories: mechanical, electrical, instrument/electronic, and consumables (chemicals, reagents, lubricants, filters, etc.).

6. Verify that tagging/marking allows tracing the item back to purchase documents, receipt documents, and quality certification documents.

Specific Guidance. Observe a sample of three - four safety related and risk significant non-safety related items stored in the warehouse.

7. Verify that safety-related items that have been received and stored offsite, (e.g., in some nearby warehouse) are being subjected to the same receipt inspection requirements as would be required if they were received onsite.

Specific Guidance. Obtain a list, if available, of any safety-related items that have been received and stored offsite (e.g., in some nearby warehouse) and spot check two items to ensure that they are being subjected to the same receipt inspection requirements as would be required if they were received onsite. Note: See section 02.02.b(1).

8. Verify appropriate cleanliness and environmental controls are and have been maintained in accordance with administrative controls.

Specific Guidance. As possible, tour the onsite and offsite warehouse facilities to confirm the administrative controls identified in 02.02.b(3).

9. Verify that the administrative control identified under 02.02.b(2)(b) are being implemented.

Specific Guidance. Visit an on or offsite plant storage area and select two-three safety related and risk significant non-safety related items currently in storage that have been identified by receiving personnel to be in nonconformance with specified requirements.

35752-03 RESOURCE ESTIMATE

The resource estimate for this inspection procedure is approximately 120 hours of direct inspection effort.

35752-04 REFERENCES:

ASME NQA-1 1994, Quality Assurance Requirements for Nuclear Facility Operations,

10 CFR 50, Appendix B, Criteria IV, VII and XIII,

NUREG - 0800, Standard Review Plan, Section 17.5, “Quality Assurance Program Description - Design Certification, Early Site Permit and New License Applicants.”

END

Attachment 1: Revision History

Attachment 1

Revision History Sheet

Commitment Tracking Number	Issue Date	Description of Change	Training Needed	Training Completion Date	Comment Resolution Accession #
N/A	10/03/07 CN 07-030	1. Initial issue to support inspections of operational programs described in IMC 2504, NON-ITAAC INSPECTIONS 2. Incorporates SRP 17.5 guidance 3. A review for incorporation of generic requirements has been conducted. None identified. 3. Combines information contained in IPs 35746 and 35747.	N/A	N/A	ML063040456