QUALITY ASSURANCE PROGRAM OUTLINE

FOR THE PACKAGING OF

RADIOACTIVE MATERIAL FOR TRANSPORT AND TRANSPORTATION

OF RADIOACTIVE MATERIAL UNDER CERTAIN CONDITIONS (10CFR71)

U. S. NUCLEAR REGULATORY COMMISSION MATERIAL

LICENSE NO. 04-17791-01

LICENSEE:

DEPARTMENT OF THE NAVY

USS BRYCE CANYON (AD-36)

FPO SAN FRANCISCO CA

96640

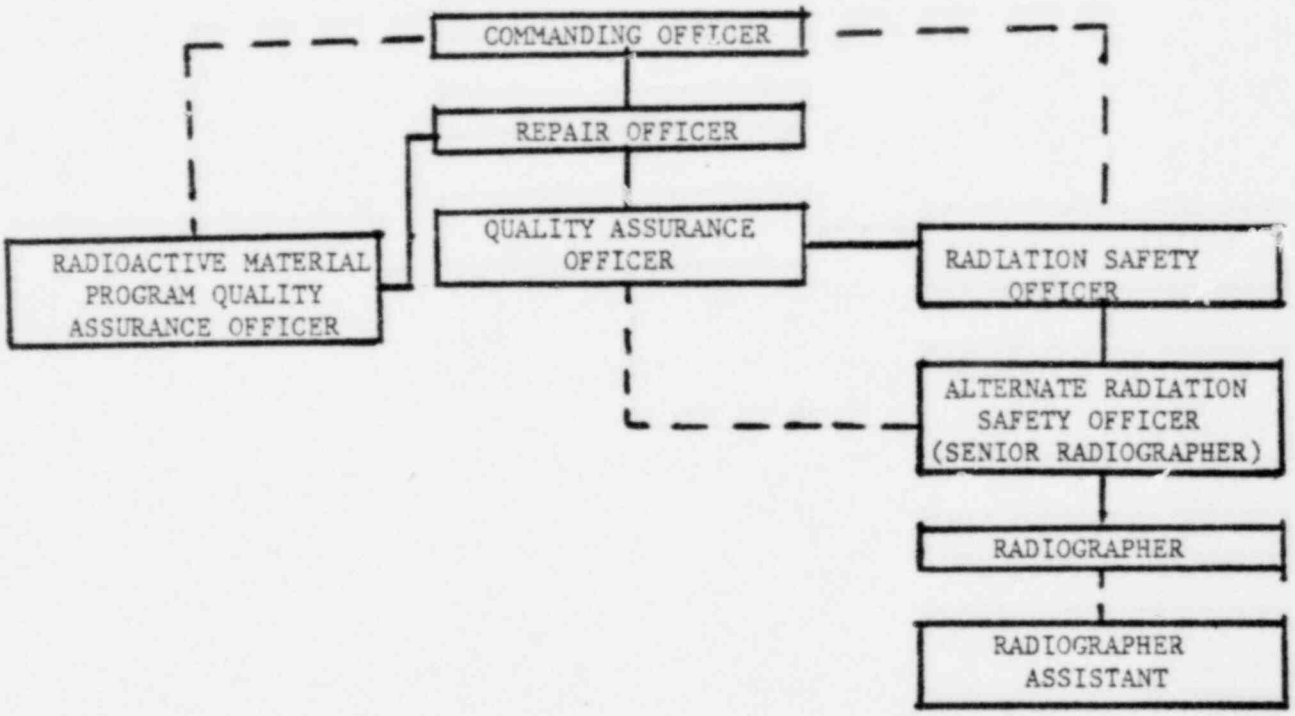
USS BRYCE CANYON (A[illegible])

10 CFR PART 71 QA PROGRAM

FOR INDUSTRIAL RADIOGRAPHY LICENSE # 04-17791-01

1. Organization. The final responsibility for the Quality Assurance (QA) program for Part 71 Requirements rests with the USS BRYCE CANYON Radiography Organization. Design and Fabrication shall not be conducted under this QA Program. The QA Program is implemented using the the following organization.

ORGANIZATION CHART



a. Commanding Officer - By definition the senior offical of the licensed activity, he is responsible for the establishment and execution of the RMPQA Program.

b. Repair Officer - In his role as Head of Department which actually uses licensed materials the Repair Officer has a vested interest in the RMPQA Program. Therefore, he is responsible for ensuring that the RMPQA Officer has sufficient organizational freedom to fulfill his function and for ensuring that corrective action(s) is/are accomplished in an effective, timely manner and is/are not being delayed by production schedules or other conflicts.

c. Quality Assurance Officer - The QA Officer is responsible to the Repair Officer for ensuring that all Radioactive Sealed Sources are stowed properly. Additionally he is responsible for all non-destructive testing and as such is the administrative supervisor of the radiographers.

d. Radiation Safety Officer - The Radiation Safety Officer is responsible for overall administration of the program, training and certification, document control, and auditing.

e. Radioactive Materials Program Quality Assurance Officer - The RMPQA Officer's primary function in the RMPQA Program is the verification of the credibility of the program. He is responsible for development of an audit schedule for approval by the Commanding Officer, conducting or directly supervising all audits, and unannounced spot checks of the RMPQA Program and reporting his findings directly to the Commanding Officer with copies to the Repair Officer, RSO, and QA Officer. He shall also conduct follow up audits to ensure corrective action is accomplished.

f. Alternate Radiation Safety Officer - The ARSO is generally the Senior Radiographer. He shall assist the RSO with the technical aspects of the Radiation Safety Program, supervise source change operations, transporting and receiving of radiographic sources, recovery of damaged sources, lost sources and other radiographic equipment malfunctions.

g. Radiographer - The Radiographers are for handling, storing, shipping, inspection, test and operating status and record keeping.

2. Quality Assurance Program. The Radiography Organization on board the USS BRYCE CANYON establishes and implements this QA Program. Training, prior to engagement, for all QA functions are required according to written procedures with the RSO's approval. The QA program will ensure that all defined QA procedures, and specific provisions of the package design approval are satisfied. The QA program will emphasize control of the characteristics of the package which are critical to safety.

The Radiation Safety Officer shall assure that all radioactive material shipping packages are designed and manufactured under a QA program approved by Nuclear Regulatory Commission for all packages designed or fabricated after the effective date of the QA Program. This requirement can be satisfied by receiving a certification to this effect from the manufacturer.

3. Document Control. All documents related to a specific shipping package will be controlled through the use of written procedures. All document changes will be performed according to writtent procedures approved by the RSO.

The Radiation Safety Officer shall insure that all QA functions are conducted in accordance with the latest applicable changes to these documents.

4. Handling Storage and Shipping. Written safety procedures concerning the handling, storage and shipping of packages for certain special form radioactive material will be followed. Shipments will not be made unless all tests, certifications, acceptances, and final inspections have been completed. Work instructions will be provided for handling, storage, and shipping operations.

Radiography personnel shall perform the critical handling, storage and shipping operations.

5. Inspection, Test and Operating Status. Inspection, test and operating status of packages for certain special form radioactive material will be indicated and controlled by written procedures. Status will be indicated by tag, label, marking or log entry. Status of nonconforming parts or packages will be positively maintained by written procedures.

Radiography personnel shall perform the regulatory required inspections and tests in accordance with written procedures. The Radiation Safety Officer shall ensure that these functions are performed.

6. Quality Assurance Records. Records of package approvals (including references and drawings), procurement, inspections, tests, operating logs, audit results, personnel training and qualifications and records of shipments will be maintained. Descriptions of equipment and written procedures will also be maintained.

These records will be maintained in accordance with written procedures. The records will be identifiable and retrievable. A list of these records, with their storage locations, will be maintained by the Radiation Safety Officer.

7. Audits. Established schedules of audits of the QA Program will be performed using written check lists. Results of audits will be maintained and reported to management. Audit reports will be evaluated and deficient areas corrected. The audits will be dependent on the safety significance of the activity being audited, but each activity will be audited at least once per year. Audit reports will be maintained as part of the quality assurance records. Members of the audit team shall have no responsibility in the activity being audited.

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