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SOUTH CAROLINA DEPARTMENT OF HEALTH AND ENVIRONMENTAL CONTROL

Albert G. Randall, M.D., M.P.H. Commissioner

Sims Avcock Buildings 2630 Bull Street, Columbia, SC 29201

July 2, 1979

Ms Marie Janinek Office of State Programs U.S. Nuclear Regulatory Commission Washington, DC 20555

Dear Ms. Janinek:

Attached is our third quarter progress report under contract #NRC-06-78-357 covering the period from October 1, 1978 through June 30, 1979.

All of the S.C. contract effort has been directed in inspections and surveillance of radioactive waste shipments into the Barnwell, S.C. area. A special emphisis was placed on the inspection of Type Ashipping casks during this quarter. A cask inspection history sheet was maintained for each cask inspected during the period.

Inspectors closely examined the cask each time it was received at the Chem-Nuclear Systems site in Barnwell, S.C. Condition of the tie-downs, securing bolts, mounting bolts, top or openings and rain covers were inspected. Trailers on which the casks were mounted were examined for cracks in the main supporting framework and/or goosenecks as well as detailed examinations of the cask mounting bolts, flanges, or retaining rings. A record was kept on the turn-around time of casks as well as the point of origin.

One highway accident involving a Type A cask containing radioactive waste occurred on June 18, 1979 in South Carolina. This accident was responded to by members of the Emergency Radiological Assistance Team of DHEC. There was no release of radioactivity.

During the month of April 1979 inspectors reviewed the shipping papers of 294 shipments of radioactive waste. In May 1979 over 530 shipping papers were reviewed. Some of the worst examples of shipping papers came from the U.S. Army, U.S. Air Force, National Guard Units and U.S. Disposal Facilities.

Radiation monitoring divices (TLD) have been placed at three terminals and along highways identified as normal routes for transporting

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radioactive waste.

We look forward to concluding this contract on September 30, 1979.

Sincerely yours

Emory F. Williams Environmental Quality Manager Bureau of Radiological Health

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REPORT OF TRANSPORTATION INSPECTIONS

| Contract | Number NRC-06-78-357 From: October 1, 1978 Through: Jun | ne 30, | , 1979 |
|----------|---|-----------|---|
| VEHICLE | INSPECTIONS Courier or Freight Forwarders | 4 | |
| | Common Carrier (not sole use) | 89 | |
| | Exclusive Use (Sole Use) | 597 | |
| | TOTAL VEHICLES INSPECTED | 690 | |
| VEHICLE | VIOLATIONS OR DISCREPANCIES | | |
| | No Placards on vehicle | 10 | |
| | Inadequate number of placards on vehicle | 9 | |
| | Exceeded mR at surface of vehicle or cask | 4 | |
| | Exceeded siR at 6-feet of vehicle or cask | 4 | |
| | Exceeded 2.0 mR in cab of tractor | 1 | |
| | Shipment or cask not secure | 15 | |
| | Contamination detected inside trailer | 8 | |
| | Contamination detected outside of trailer | 1 | |
| PACKAGE | INSPECTIONS EXEMPT WHITE YELLOW YELLOW QUAN I II III | À | LSA |
| TYPE A | A PACKAGES | | |
| | Radiopharmaceuticals 0 0 0 | | 0 |
| | Devices/Sources 0 0 1 0 | | 0 |
| | Radioactive Waste 0 336 68 30 | | 659 |
| TYPE B C | CONTAINERS | | |
| | Spent Fuel 0 0 | | - |
| | Non-fuel bearing reactor components 0 2 | **** | 0 |
| | Radioactive Waste 0 0 0 0 | | 0 |
| | Total - Label Category 0 336 69 32 | . * * * * | 659 |
| | TOTAL PACKAGES INSPECTED | | THE RESERVE THE PROPERTY OF THE PERSON NAMED IN |

| PACKAGE | VIOLATIONS OR DISCREPANCIES : : : | | MPT AN | | | YELL | | ELL(| | LSA |
|--|--------------------------------------|------|-----------|------|-------|------|-------|------|-----|-----|
| | Package Seal Broken or Inadequate | | | | | | | | | |
| | Туре А | (|) ,, | . 4 | | 1 | | 1 | | 38 |
| | Туре в | | ** | . 0 | | 0 | * 1.8 | 0 | *** | 0 |
| | Package Damaged | (|) , , | . 2 | | 2 | | 1 | | 6 |
| | Package or Container Leaking | (| | . 0 | | 0 | | Ç | *** | 4 |
| | Non-specification package | (|) | . 0 | × + + | 1 | | 6 | *** | 8 |
| | Contamination detected on package. | (| | . 0 | | 0 | | 0 | | 9 |
| | No Labels on Package | | ٠ | . 4 | *** | 39 | | 0 | | 42 |
| | Unly one label on package | | | . 0 | | 0 | | 0 | | 0 |
| | Isotope not shown on label | | | . 66 | | 2 | | 5 | | - |
| | Curies not shown on label | | | . 68 | | 1 | * * * | 5 | | 1- |
| | Transportation Index not shown on | labe | i.,, | | | 0 | | 0 | | - |
| | Transportation Index not correct | | | | | 2 | | 4 | | - |
| | Improper Labeling on Package, | | | . 4 | * * * | 8 | | 6 | | 62 |
| | Discrepancies with Type A Cask | ina. | | × | | 1 | | 6 | | 17 |
| | | | ** | | 444 | | | | | |
| | | | | | | | | | | |
| CONTAMINATION SMEARS TAKEN AND AHALYSED | | | | | | 82 | 4 | | | |
| NUMBER OF AREA AND PERSONNEL MONITORING DEVICES PLACED | | | | | | | 6 | 1 | | |
| | F JOINT INSPECTIONS CONDUCTED WITH P | | | | | | | 2 | 26 | |
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SIGNED: Ewillian

DATE: JUL 2 1979

Bureau of Radiological Houlth S. C. Department of Marith & Environmental Control 2600 BULL ST. COLUMBIA, S. C. 20001

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CASK INSPECTION HISTORY

| The second secon | | | | | | | | | |
|--|--|---|------------|--|--|--|--|--|--|
| Certification Number | Expiration Date | Cask Nodel Number: | | | | | | | |
| | | Other ID: | | | | | | | |
| | | Shape of Cask: | | | | | | | |
| | | Color(s): Owner of Cask: Mounted on Trailer No: | | | | | | | |
| | | | | | | | | | |
| | | | | | | | | | |
| | | Type of Trailer: | | | | | | | |
| | Trailer Owned By: | | | | | | | | |
| | | OTHER INFORMATION | | | | | | | |
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