STAFF REPORT AND EVALUATION

OF THE

NEW YORK STATE DEPARTMENT OF HEALTH

RADIATION CONTROL PROGRAM

FOR THE PERIOD

MARCH 16, 1984 TO APRIL 5, 1985

23rd REGULATORY PROGRAM REVIEW

June 3, 1985

in the faith

David Axelrod, M.D., Commissioner New York State Department of Health Empire State Plaza Tower Building Albany, New York 12237

9506140160

Dear Dr. Axelrod:

This is to confirm the discussion Mr. John McGrath, Region I State Agreements Office and Mr. Donald A. Nussbaumer, Assistant Director for State Agreements Program, Office of State Programs held with you and your staff on April 5, 1985 following our review and evaluation of the Department's radiation control program. This review covered the principal administrative and technical aspects of this program and included an examination of the program's legislation and regulations, organization, management and administration, personnel, licensing and compliance. The review also included field evaluations of inspectors in your Rochester and New Rochelle regional offices.

The review was performed in accordance with the NRC policy defined in the "Guidance for NRC Review of Agreement State Radiation Control Programs." These guidelines were published in the Federal Register on December 4, 1981, and define the 30 indicators that are used for evaluating Agreement State Programs. A description of how the indicators are used in reporting the results of program reviews to State management is enclosed (Enclosure 1).

As a result of our review of the Department's program and the routine exchange of information between the NRC and the Department, the staff believes that the Department's program for regulating agreement materials is adequate to protect the public health and safety. A finding of compatibility is again not being made due to the status of the Department's radiation control regulations.

During our two previous reviews, we commented on the need to update the Department's regulations. Although some effort has been made to prepare revised drafts of amendments, final action has not been completed. We recommend that the Department give this project priority consideration in 1985. Dr. Rimawi has indicated his staff will be providing a copy of the most recent draft to this office for review. Please be assured that we will expedite our review and provide you with our comments as soon as possible. If there are any other ways we can assist you in expediting the adoption of these regulations please let us know. Status of Regulations is a Category I indicator.

We were pleased to note improvement in the management of the inspection program. Coordination between Headquarters and the field offices is good and supervisory accompaniment of inspectors is being carried out. There has been a continued reduction in the inspection backlog and we believe that the remaining backlog can be eliminated by the end of the year. We would suggest that emphasis be placed on the five Priority I licenses that were overdue according to your priority system at the time of our review.

172 -

David Axelrod

Clerical support in the New Rochelle regional office has improved over that noted during our last previous review. However, professional personnel are still required to do their own filing. We note that the New Rochelle office has the largest workload of any of the regional offices and currently has the largest inspection backlog. Additional effort to reduce the administrative burden on the professional staff should be made.

We would appreciate your review and response to our comments and recommendations. In addition, Enclosure 2 contains comments regarding the technical aspects of our review. We would appreciate Dr. Rimawi's review and response to these comments.

In accordance with NRC practice, I am enclosing a copy of this letter for placement in the State Public Document Room, or otherwise to be made available for public review.

I appreciate the courtesy and cooperation extended by you and your staff to our representatives during the review.

Sincerely,

Original signed by

Thomas E. Murley Thomas E. Murley Regional Administrator

Enclosures: As Stated

| L. Hetling, NYSH K. Rimawi, NYSH D. Sencer, NYCH L. Roberts, NYSL H. Williams, NYDEC G. W. Kerr, OSP NRC Public Document Room | | JMcGrath DNussbaumer SP01 | |
|---|-----------------|---------------------------------|--------------------|
| State Public Document Ro RI: SAOP H& G. SPOR JMcGrath/mrf & GWKerr | EDO WJDincks | DRA: RI JMAllan | RA: RI TEMurley |
| 5/9/85 5/15/85 | 5/ 1/85 | 5/1. /85 | 5/31/85 |

OFFICIAL RECORD COPY

2

Enclosure 1

Application of "Guidelines for NRC Review of Agreement State Radiation Control Programs"

The "Guidelines for NRC Review of Agreement State Radiation Control Programs," were published in the Federal Register on December 4, 1981 as an NRC Policy Statement. The Guide provides 30 Indicators for evaluating Agreement State program areas. Guidance as to their relative importance to an Agreement State program is provided by categorizing the Indicators into 2 categories.

Category I indicators address program functions which directly relate to the State's ability to protect the public health and safety. If significant problems exist in several Category I indicator areas, then the need for improvements may be critical.

Category II indicators address program functions which provide essential technical and administrative support for the primary program functions. Good performance in meeting the guidelines for these indicators is essential in order to avoid the development of problems in one or more of the principal program areas, i.e. those that fall under Category I indicators. Category II indicators frequently can be used to identify underlying problems that are causing, or contributing to, difficulties in Category I indicators.

It is the NRC's intention to use these categories in the following manner. In reporting findings to State management, the NRC will indicate the category of each comment made. If no significant Category I comments are provided, this will indicate that the program is adequate to protect the public health and safety. If at least one significant Category I comment is provided, the State will be notified that the program deficiency may seriously affect the State's ability to protect the public health and safety and should be addressed on a priority basis. When more than one significant Category I comment is provided. the State will be notified that the need of improvement in the particular program areas is critical. The NRC would request an immediate response, and may perform a follow-up review of the program within six months. If the State program has not improved or if additional deficiencies have developed, the NRC may institute proceedings to suspend or revoke all or part of the Agreement. Category II comments would concern functions and activities which support the State program and therefore would not be critical to the State's ability to protect the public. The State will be asked to respond to these comments and the State's actions will be evaluated during the next regular program review.

ENCLOSURE 2

TECHNICAL COMMENTS AND RECOMMENDATIONS ON THE NEW YORK STATE DEPARTMENT OF HEALTH RADIATION CONTROL PROGRAM

I. Technical Quality of Licensing Actions

Technical Quality of Licensing Action is a Category I indicator. The following is of minor significance

Comment

Licensing actions were for the most part adequately supported. Some minor deficiencies were noted however, such as missing standard conditions and inadequate supporting documentation in the following areas: facility descriptions, dose calibrator procedures, and brachytherapy procedures. One particular license application for a brachytherapy license was deficient in the lack of a number of important safety procedures.

Recommendation

We recommend that additional care be taken in the review of license applications to assure that all necessary supporting documentation is submitted prior to issuance of a license. We believe that the referenced brachytherapy licensee should be requested to submit the required procedures.

II. Enforcement Procedures

Enforcement procedures is a Category I indicator. The following comments are of minor significance.

Comment

The review of a number of enforcement letters revealed that in some cases violations of regulations or license conditions were addressed as recommendations rather than cited as violations.

Recommendation

We believe that all violations of the code and specific license conditions should be referred to as such in enforcement correspondence.

Comment

In the review of enforcement actions, two cases were noted where the State could have taken stronger enforcement action. In the first case, involving a type C broad academic license in the Buffalo area, the licensee has had a poor compliance record for 10 years, with continuous repeat violations. The second case involved a medical licensee in the New Rochelle region where numerous violations, some of which were addressed as recommendations rather than items of noncompliance, were contested by the licensee. Although the State plans escalated enforcement action in this case, the delay in taking such action may have weakened the State's case.

Recommendation

We recommend that in cases where repeat or uncorrected violations from the last previous inspection indicate a licensee's continued poor compliance record, escalated enforcement action should be instituted. All enforcement actions should be taken on a timely basis.

III Inspection Reports

Inspection reports is a Category II indicator.

Comment.

In Agreement States where inspection activities are conducted from regional offices, we believe that it is important for management to review inspection reports on a timely basis to assure that enforcement actions are consistent with State policy. Our review noted that in the past, inspection reports did not always receive attention in Albany on a timely basis.

Recommendation

Although recent inspection reports have shown definite improvement in this area, the Department should monitor these reviews to assure that they continue to be conducted on a timely basis.

Comment

Inspection reports do not always provide adequate documentation to support items of noncompliance, e.g., some reports contained statements to the effect that records were "incomplete."

Recommendation

Inspection reports should provide sufficiently detailed information to support enforcement actions. Supervisory review of reports should include an examination of this aspect of inspection documentation.

Comment

The State has, on occasion, cited licensees for failure to keep exposures as low as reasonably achievable (ALARA), however, inspection reports do not always indicate the status of the licensee's ALARA program.

Recommendation

We suggest that a section be added to your inspection form for inspectors to document the status of the licensee's ALARA program.

| RADIATION CONTROL PROGRAM: | : New York State Department of Health |
|----------------------------|--|
| REVIEW MEETING NUMBER: | 23rd |
| DATES OF REVIEW: | April 2-5, 1985 |
| PERIOD OF REVIEW: | March 6, 1984 - April 5, 1985 |
| NRC REPRESENTATIVE: | John R. McGrath |
| RADIATION CONTROL PROGRAM | REPRESENTATIVES: Karim Rimawi, Director, Bureau of |
| | Environmental Radiation Protection; |
| | Diane Dreikorn, Chief, Radioactive Materials |
| | Licensing Section |

CONCLUSIONS

The New York State Department of Health program for control of agreement materials is, in the staff's opinion, adequate to protect the public health and safety. A finding of compatibility is again being deferred until the Department completes action to update its regulations.

SUMMARY MEETING WITH MANAGEMENT

A summary meeting to present the results of the regulatory program review was held with Dr. David Axelrod, Commissioner of Health on April 5, 1985. Also present were Dr. Randolph, Director, Office of Public Health, Dr. Staziuk, Director, Center for Environmental Health; Dr. Hetling, Director, Division of Environmental Protection; and Dr. Rimawi, Director, Bureau of Environmental Radiation Protection. The reviewer discussed progress made by the program since the previous review. This includes the development of draft regulations, the further reduction in the inspection backlog, some improvement in the clerical situation in New Rochelle, and better coordination with the regions. With regard to the present status of the program, the reviewer noted that the NRC would again defer a finding of compatibility until the Department formally adopts the amendments to its regulations. With regard to licensing actions the reviewer stated that for the most part such actions were adequately supported. Some minor deficiencies were noted however, such as missing standard conditions and inadequate supporting documentation in the following areas: facility descriptions, dose calibrator procedures, and brachytherapy procedures. In the compliance area, the reviewer indicated that the program could be improved in a number of areas. Some enforcement letters addressed violations of regulations or license conditions in terms of recommendations rather than citing them as violations. In some cases citations were unclear. There were at least two other cases where the State could have taken stronger enforcement action. The reviewer also noted that the State needs to improve documentation which supports items of noncompliance.

Dr. Axelrod, as he has done during previous reviews, expressed his view that the State should withdraw from the Agreement State program. Since his efforts in this area have met with some resistance in the past, Dr. Axelrod indicated that the State will endeavor to maintain an adequate program.

PROGRAM CHANGES RELATED TO PREVIOUS NRC COMMENTS AND RECOMMENDATIONS

Comment and Recommendations

Status of Regulations, a Category I indicator, specifies that an Agreement State must have regulations that are essentially identical to 10 CFR Parts 19 and 20 and must have a high degree of uniformity with other NRC regulations. The Department's current radiation control regulations pertaining to radioactive materials have not been updated in their entirety since 1979. However, during this same time period numerous changes have been made to NRC regulations to reflect changing technology, increased knowledge, recent recommendations of technical advisory groups, and improved regulatory programs. It should be noted that we made a similar comment following our October 1982 review of your program. Since that time, your Radiation Control Program staff has prepared preliminary revisions to the radioactive materials regulations.

We examined these preliminary revisions during our review. We urge that staff plans to submit these revisions for adoption by mid June be completed. We would however, appreciate an opportunity to review the final draft of this revision prior to their being submitted for adoption. We understand the adoption process will taken about 4 to 5 months. When the regulations become effective, we will then be able to make a finding regarding compatibility of the Department's program.

State Response

The Department is continuing efforts to complete the revision of 10 NYCRR 16 to achieve compatibility with 10 CFR Parts 19 and 20, in addition to other recently revised NRC regulations applicable to our program. It is anticipated that completion of the revision in entirety of 10 NYCRR 16 will be accomplished in 1984. A final draft will be provided to the NRC Regional Representative for review prior to final adoption of these regulations.

Current Status

Although the State has taken some action in redrafting proposed amendments to 10 NYCRR 16, the formal adoption process has not yet been completed.

2. Comment and Recommendation

As discussed during the meeting we found significant improvement in the compliance part of the program and in the working relationship between central and regional office staff. In the past this had been a continuing difficulty faced by the program. We believe the attention and support given to the program by you and your staff and the additional emphasis a time being devoted to radioactive materials compliance activities in the

2

regional offices have directly contributed to these improvements. In particular, during this review we noted the number of overdue inspections has decreased from 176 to 76. We also noted that an improved working relationship between central and regional office staff has been established including annual and periodic meetings between central and regional office management and technical staff to review work requirements, program status and any difficulties affecting program performance. We urge that these and other information exchange and communication activities continue. Comment I and II.1 of Enclosure 2 contain some specific suggestions we discussed with both central and regional office staff which we believe can help ensure your program continues to operate effectively.

State Response

The Department plans to continue to place radioactive material inspections as a high priority item for 1984. It is anticipated that the existing backlog of 56 radioactive material inspections, as of April 30, 1984, will be eliminated or considerably reduced by the end of 1984.

Current Status

The inspection backlog has been further reduced to 57 from the 76 noted during the previous review. It should be noted that many of these would not be considered overdue under the NRC inspection priority system. Annual and periodic meetings with the regional inspectors continue to be held.

3. Comment and Recommendations

One difficulty noted at the New Rochelle Regional Office was the lack of assigned clerical support to the radioactive materials program. Action being taken by the regional office to provide such support should be promptly completed to relieve the technical staff from having to routinely perform clerical duties. The provision of adequate clerical support is a Category II indicator.

State Response

The New Rochelle Regional Office has approval to fill the existing clerical staff vacancy and will continue efforts to fill the position. Once a suitable candidate is found, efforts to eliminate the need for the technical staff to perform clerical duties will be made.

3

Current Status

The New Rochelle staff reported that the clerical situation has improved somewhat with regard to typing, but the professional staff still have to do their own filing.

4. Comment

The Department has prepared administrative procedure RAD 324 "Inspection of Radioactive Materials Installations." Regional office inspectors, however, did not have copies readily available. In some cases, the procedure was not being consistently following (e.g., licensee replies to enforcement letters were not acknowledged in all cases). Also, specific technical inspection procedures setting out guidance on the conduct of inspections were not available. Such procedures are valuable when preparing for inspections, in ensuring consistency in the inspections conducted and in training new staff.

Recommendation

We recommend that all personnel conducting inspections have copies of both RAD 324 and specific inspection procedures on the conduct of inspections available for use. As a part of the annual or periodic meetings with each regional office, such procedures should be discussed with inspectors including any problems they may be experiencing in their use. In lieu of diverting resources to prepare specific inspection procedures at this time, we suggest the Department use existing NRC inspection guides prepared by or made available by NRC Office of State Programs.

State Response

All Regional/Area offices maintain an Environmental Health manual containing RAD 324 in addition to other program related policies and procedures. A handbook for Regional/Area Office Radiological Health Specialists containing Environmental Health Manual items specific for the Bureau and pertinent guides relating to licensing and inspection of radioactive materials has been prepared and was distributed during the week of May 7, 1984. It is anticipated that this handbook will serve as an excellent resource for Regional Radiological Health Specialists and help achieve program uniformity statewide.

Current Status

Regional staff now have copies of the appropriate procedures.

5. Comment

Central and regional office management and staff meet at the beginning of each year and periodically throughout the year to review workload requirements, program status, and to discuss current items of interest. However, no formal supervisory review or audit of regional office activities, takes place as a part of these meetings.

Recommendation

As part of the overall management of the radiation control program, an audit of each regional office should be performed by central office staff, including accompaniment of inspectors during the conduct of inspections. Such an audit could easily be carried out yearly as a part of the annual meeting with each regional office.

State Response

The Bureau plans to develop an audit program for review of regional office program activities. The development and implementation of this audit program is targeted for 1984 or early 1985. NRC criteria for evaluation of Agreement Materials Programs will be used as a guide in the development of this program.

Current Status

The annual office visits have been expanded. Annual field evaluations of inspectors are now being performed.

6. Comment

A number of inspection reports and letters requiring supervisory review at your central office are beginning to accumulate and no formal comments on these reports and letters are being provided to inspectors based on the reviews. In addition, detailed information on the status of the compliance program is being maintained and used by central office radiation control program staff to periodically assess the status of the compliance program. This information, however, is not being fully used by program management and supervisory staff as a tool to ensure that all inspection reports, enforcement correspondence, supervisory reviews and comments to inspectors are completed for each inspection conducted.

Recommendation

A structured process for supervisory review and comment on inspection reports and letters should be started to make sure a backlog in reports and letters requiring review does not develop. This process should include a periodic assessment and feedback to inspectors on the results of the review and status of their activities based on information received by the central office.

State Response

None

Current Sta us

Although recent inspection reports have shown some improvement in this area, program management needs to monitor supervisory reviews of reports to assure that they continue to be conducted on a timely basis.

7. Comment

Our review of selected license files showed there is a need for more attention to detail in the review of applications, drafting of licenses and final editorial review of licensing actions prior to signature and dispatch. Specific examples were discussed with staff during the meeting including several applications and licenses which did not specify the manufacturer's name and model number for all sealed sources and devices authorized in the license.

Recommendation

We recommend that staff devote greater attention to detail in the review of license applications and drafting of licenses. In particular, we suggest a final editorial review of the license and a check of the license against the application prior to signature and dispatch.

State Response

The radioactive materials licensing section is continuing efforts to pay attention to specific detail during radioactive material license application review. Editorial reviews and "double" checks are being coordinated with staff reviewing license applications.

Current Status

Some minor deficiencies are still evident in the licensing program, such as missing conditions and inadequate supporting documentation. Details can be found in the "Licensing" section of this report.

EVALUATION OF AGREEMENT STATE RADIATION CONTROL PROGRAM STATE REVIEW GUIDELINES, QUESTIONS AND ASSESSMENTS Name of State Program: New York State Department of Health Date of NRC Review (Month Year): April 1985

I. LEGISLATION AND REGULATIONS

A. Legal Authority (Category I)

NRC Guidelines: Clear statutory authority should exist, designating a state radiation control agency and providing for promulgation of regulations, licensing, inspection and enforcement. States regulating uranium or thorium recovery and associated wastes pursuant to the Uranium Mill Tailings Radiation Control Act of 1978 (UMTRCA) must have statutes enacted to establish clear authority for the State to carry out the requirements of UMTRCA. Where regulatory responsibilities are divided between State agencies, clear understandings should exist as to division of responsibilities and requirements for coordination.

Questions:

 Please list all currently effective legislation that impacts the State's radiation control program.

The statutory authority to regulate agreement materials is contained in Public Health Law 225.

2. What changes have been made to the statutory authority of the Radiation Control Program (RCP) to license, inspect, and otherwise regulate agreement materials since the last review?

None.

 If your State regulates uranium or thorium recovery operations and associated wastes pursuant to an amended agreement and UMTRCA, explain any changes to the statutory authority for these functions.

N/A.

4. Are copies of the current enabling act and other statutes (e.g., Administrative Procedures Act, Sunshine Act., etc.) which govern the conduct of the agreement materials program on file in the RCP office and with the NRC? If revisions have occurred since the last review, the changes should be included.

Yes.

5. If the State's regulatory authorities are divided between agencies, what procedures and memoranda are in effect to provide clear understanding of the divisions of responsibilities and requirements for coordination?

Regulatory responsibilities are divided between several State agencies. The New York State Department of Health (NYSDOH) is responsible for all medical and academic uses of radioactive materials throughout New York State, excluding New York City. The New York City Department of Health has similar responsibility as NYSDOH within the New York City limits. As of October 1, 1982, the NYSDOH is also responsible for the environmental radiation surveillance program in New York State. The New York State Department of Environmental Conservation maintains a permit program for installations that discharge radioactive materials to the environment. The New York State Department of Labor is responsible for all commercial and industrial uses of radioactive materials throughout New York State.

Coordination is the responsibility of the New York State Energy Office by statute.

In addition, a recently formed "coordination committee" composed of program directors from the various agencies was developed to improve coordination efforts of the radiation program within New York State.

- 6. Does the State have the authority to:
 - a. apply civil penalties? If so, cite legislation.

Yes, Title IO, Chapter II, Administrative Rules and Regulations, Part 76.

b. collect fees? If so, cite legislation.

Yes. However fees are being collected only from X-ray registrants, not radioactive materials licensees.

require surety or long-term care funds? If so, cite legislation.

No.

d. require performance bonds or sureties for decommissioning licensed facilities? If so, cite legislation.

No.

 require performance bonds or sureties for clean-up of licensed facilities after a contamination accident? If so, cite legislation.

No.

f. require long-term care funds for uranium mill or low-level waste facilities? If so cite legislation.

N/A.

g. enter into low-level waste compacts? If so, cite legislation.

No.

h. establish, license and/or operate a low-level waste site?

No. However, draft legislation addressing this issue has been prepared. A copy is available in Region I files.

 If any responses to the above question are negative, explain any plans the State may have regarding those issues.

In addition to the low-level waste legislation discussed in question 6.h. above, the State plans to propose legislation requiring bonds or sureties for decontamination and decommissioning of licensed facilities. The development of such legislation will be coordinated with the other New York licensing agencies.

I. Reviewer Assessment:

- A. The Department meets all indicator guidelines. In addition to the legislation discussed above, there are a number of bills currently before the legislature that would have some impact on radioactive materials. Senate Bill 4348 would require state police escorts for all "high level radioactive materials" shipped over public highways. Senate Bill 4355 concerns emergency preparedness and would require periodic evaluation of communication resources in the State. Senate Bill 4356 would require inspections of motor carriers of high-level radioactive waste. Senate Bill 4357 has the most far-reaching potential impact on the agreement program. The bill would create a new State Office for Radiological Safety which would consolidate the function of the agencies currently involved in the materials program and would include NYSERDA and radiation functions of the Division of Military and Naval Affairs, State Police, and the Departments of Transportation and Environmental Conservation. Copies of these bills are available in Region I files. Comments on the bills have been provided to the State.
- B. Status of Regulations (Category I)

NRC Guidelines: The State should have regulations essentially identical to 10 CFR Part 19, Part 20 (radiation dose standards and effluent limits), and those required by UMTRCA, as implemented by Part 40. The State should adopt other regulations to maintain a high degree of uniformity with NRC regulations.

Questions:

 When did the RCP last amend regulations in order to maintain compatibility and when did the revisions become effective?

July 13, 1979.

 Referring to the enclosed NRC chronology of amendments (Attachment A) note the effective date of the NRC changes last adopted by the RCP.

See the NRC Chronology attached as Appendix A.

3.a. Were there any compatibility items that were not adopted by the RCP?

Yes.

b. If so, please identify and explain why they were not adopted.

See Appendix A.

B. Reviewer Assessment

There are a number of changes to NRC regulations which have not yet been incorporated into the State Sanitary Code, Chapter 1, Part 16. For this reason a finding of compatibility could not be made at this time. The Department has prepared proposed revisions to Part 16 and they will provide a copy to NRC for review shortly. As noted in Appendix A, the revision should cover all of the necessary provisions not currently in Part 16.

C. Updating of Regulations (Category II)

NRC Guidelines: The RCP should establish procedures for effecting appropriate amendments to State regulations in a timely manner, normally within 3 years of adoption by NRC. For those regulations deemed a matter of compatibility by NRC, State regulations should be amended as soon as practicable but no later than 3 years. Opportunity should be provided for the public to comment on proposed regulation changes. (Required by UMTRCA for uranium mill regulation.) Pursuant to the terms of the Agreement, opportunity should be provided for the NRC to comment on draft changes in State regulations.

 Does the RCP have a schedule or program for revising and adopting changes to regulations within three years of adoption by the NRC?

Yes.

 Has the RCP adopted all regulations deemed a matter of compatibility by NRC within three years? (Refer to NRC chronology).

No. See Appendix A.

 What are the RCP's procedures for adopting new regulations? Briefly describe each step in the procedure.

The Department's procedures for adopting new regulations are contained in Item No. 71 "Processing Revisions to the NYCRR (New York Codes, Rules and Regulations)" of the Department's Administrative Policy and Procedures Manual dated September 1, 1981. A copy of this procedure is available in Region I files.

4. How is the public involved in the process?

The above referenced procedures provide for the publication of agency actions by the Department of State in the State Register. A 3D day comment period is normally required.

a. Does the NRC have the opportunity to comment on draft changes to RCP regulations?

Yes.

b. If so, does the RCP respond to the comments?

Yes.

C. Reviewer Assessment

Although the Department tries to amend its regulations at three year intervals, staff turnover and unexpected problems such as the EAD case have resulted in delays in completing the task. Now that the program is fully staffed and there are no urgent problem areas, the staff should be able to put the necessary effort into finalizing the regulations.

II ORGANIZATION

A. Location of the Radiation Control Program Within the State Organization (Category II)

NRC Guidelines: The RCP should be located in a State organization parallel with comparable health and safety programs. The Program Director should have access to appropriate levels of State management.

 Attach a dated organization chart(s) showing the RCP and its location within the department and State organization.

Organization charts showing the location of the RCP are attached as Appendix B.

 Is the RCP on a comparable level within the State organization with other health and safety programs so as to compete effectively for funds and staff?

Yes. The Bureau of Environmental Radiation Protection, Dr. Karim Rimawi, Director, is one of three bureaus in the Division of Environmental Protection, Dr. Leo Hetling, Director. This is one of two Divisions in the Center for Environmental Health, Dr. William Stasiuk, Director. The Center is under the Office of Public Health, Dr. Linda Randolph, Director. Dr. Randolph reports directly to Dr. David Axelrod, Commissioner of Health.

3. Does the program director have access to appropriate levels of State management?

Yes.

II A. Reviewer Assessment

The Department meets all indicator guidelines. The Field Operations Management Group in the Office of Public Health is now directed by Mr. Donald Davidoff. The Group manages the regional offices.

B. Internal Organization of the RCP (Category II)

NRC Guidelines: The RCP should be organized with the view toward achieving an acceptable degree of staff efficiency, place appropriate emphasis on major program functions, and provide specific lines of supervision from program management for the execution of program policy. Where regional offices are utilized, the lines of communication and administrative control between the regions and the central office (Program Director) should be clearly drawn to provide uniformity in inspection policy, procedures and supervision.

Questions:

1. Attach dated copies of your internal RCP organization charts.

An organization chart for the Bureau of Environmental Radiation Protection is attached as Appendix C.

2. How is the RCP organized so as to provide specific lines of supervision from program management for executing program policy?

The Bureau has four sections, Environmental Radiation, Radioactive Materials Licensing, Radiation Equipment, and Radiologic Technology. Each section has a chief who reports directly to the Bureau Director.

- 3. If regional offices are used:
 - a. To whom do regional personnel report administratively?

Regional personnel report administratively to the Regional Engineer.

b. To whom do regional personnel report technically?

Regional personnel report technically to the Bureau Director and Section Chief, Radioactive Materials Licensing Section.

- If the RCP contracts with other agencies to administer the program:
 - Identify the contracting agencies and indicate their responsibilities.
 - b. To whom do contract personnel report administratively?
 - c. To whom do contract personnel report technically?

N/A.

B. Reviewer Assessment

The Department meets all indicator guidelines. The lines of communication and administrative control between the regions and the central office have improved in the past two years.

C. Legal Assistance (Category II)

NRC Guidelines: Legal staff should be assigned to assist the RCP, or procedures should exist to obtain legal assistance expeditiously. Legal staff should be knowledgeable regarding the RCP program, statutes, and regulations.

Questions:

 Are legal staff members assigned to assist the RCP or do procedures exist to obtain legal assistance expeditiously?

The Office of General Counsel, Division of Legal Affairs, does not have staff directly assigned to the RCP. When needed, legal staff are available to provide assistance in an expedient manner.

Is the legal staff knowledgeable regarding the RCP, statutes, regulations and needs?

The Office of General Counsel staff is knowledgeable and able to provide assistance regarding the RCP statutes and regulations.

 If legal assistance was utilized since last review, provide a summary of the circumstances.

Legal assistance was requested in two instances since the last review. In the first case, the Bureau requested an opinion as to whether the Bureau could authorize nuclear medicine technologists to perform intravenous injections of radiopharmaceuticals and whether the Bureau could impose minimum educational requirements on nuclear medicine technologists without their licensure by the State. The legal staff opinion was that the Bureau could not supersede the "Education Law" which prohibits injection by nuclear medicine technologists but that the Bureau could set minimum qualification requirements for technologist. The Department has not taken any action on this yet.

In the second case, the Bureau requested an opinion as to whether hospital health physicists or dosimetrists could remove brachytherapy sources from patients. The response was that the removal of the sources constituted a medical procedure and therefore could not be performed by a non-physician.

11 C. Reviewer Assessment

The Department meets these indicator guidelines.

D. Technical Advisory Committees (Category II)

NRC Guidelines: Technical Committees, Federal Agencies, and other resource organizations should be used to extend staff capabilities for unique or technically complex problems. A State Medical Advisory Committee should be used to provide broad guidance on the uses of radioactive drugs in or on humans. The Committee should represent a wide spectrum of medical disciplines. The Committee should advise the RCP on policy matters and regulations related to use of radioisotopes in or on humans. Procedures should be developed to avoid conflict of interest, even though Committees are advisory. This does not mean that representatives of the regulated community should not serve on advisory committees or not be used as consultants.

Questions:

 Discuss practices followed for obtaining technical assistance when needed (e.g., consultants, technical and medical advisory committees, licensees, the NRC and other State and Federal Agencies).

Technical assistance from consultants, committees, and Federal agencies is obtained by telephone or written request, depending upon the severity or urgency of the issue.

8

2. What steps are taken to avoid conflicts of interest?

Such conflicts are avoided by selecting members of the committee to review specific cases only when they are not directly associated with the requesting licensee or facility.

 Are any committees involved in setting policies? If so, explain.

No. Committee members serve in an advisory capacity only.

 Attach a list showing the membership, specialties and affiliations of the Medical and/or Technical Advisory Committees.

A list of members for each of the committees is available in Region I files. The three committees are: 1) the Radiological Health Advisory Committee, 2) the Committee on Radioactive Materials in the Environment, and 3) the Radiologic Technologist Board of Examiners.

 Indicate whether the advisory committees are established by statute, by appointment of the Governor, by appointment of the Board of Health, by appointment of the Agency, or by other means.

The Radiological Health Advisory Committee and the Committee on Radioactive Materials in the Environment were established by Public Health Law Section 206. The Radiologic Technologist Board of Examiners was established by Public Health Law Section 3503. Members of all committees are nominated by the Bureau and approved by the Commissioner of Health.

6. What is the formal meeting frequency of each committee, and are minutes of committee meetings prepared?

The Radiological Health Advisory Committee and the Committee on Radioactive Materials in the Environment meet annually. The Radiologic Technologist Board of Examiners meets a minimum of twice a year. Emergency meetings may be called when necessary. Minutes of the meetings are kept.

7. What was the date of the last formal meeting of each committee?

The last Radiological Health Advisory Committee meeting was held June 28, 1984. The last Committee on Radioactive Materials in the Environment meeting was held on June 12, 1984. The last Radiologic Technologist Board of Examiners meeting was held on October 25, 1984. 8. Are individual committee members contacted for consultation?

The Radiological Health Advisory Committee members may be contacted individually for consultation. Members are chosen depending on their area of expertise to review non-routine use protocols for radioactive materials and radiation producing equipment, and investigational new drug p.otocols.

The Committee on Radioactive Materials in the Environment members are contacted for consultation by mail to all members, or a meeting.

Radiologic Technologist Board of Examiners members may be contacted individually for consultation. Members are chosen depending on their area of expertise.

 Discuss how each committee is used, the average workload placed on the committee, and the remuneration, if any.

There is no pattern as to the workload placed on the committee. Committee members address issues as the need arises, and when their expertise and consultation is needed. Committee members are paid \$100 per eight hours utilized in review. Radiologic Technologist Board of Examiners members are not paid.

** D. Reviewer Assessment

The Department meets these indicator guidelines.

III. MANAGEMENT AND ADMINISTRATION

A. Quality of Emergency Planning (Category I)

NRC Guidelines: The State RCP should have a written plan for response to such incidents as spills, overexposures, transportation accidents, fire or explosion, theft, etc.

The Plan should define the responsibilities and actions to be taken by State agencies. The Plan should be specific as to persons responsible for initiating response actions, conducting operations and cleanup. Emergency communication procedures should be adequately established with appropriate local, county and State agencies. Plans should be distributed to appropriate persons and agencies. NRC should be provided the opportunity to comment on the Plan while in draft form.

The plan should be reviewed annually by Program staff for adequacy and to determine that content is current. Periodic drills should be performed to test the plan.

Questions:

 Is the RCP responsible for its own emergency plan or are arcidents involving radioactive materials incorporated into a comprehensive State plan developed and administered by another State agency? Please provide copies of all applicable plans for review.

The State Disaster Preparedness Plan designates the Department of Health as the lead agency for response to radiological emergencies. The RCP is the primary response office within the Department of Health for these emergencies.

The RCP is responsible for its own emergency procedures (RAD 320) for radiological emergencies or incidents involving radioactive materials or radiation producing equipment, and all reported radiation exposures or accidental exposures.

Planning for nuclear power plant emergencies is not the responsibility of the RCP. The RCP is the lead office for radiological assessment and evaluation.

What written procedures or plans does the RCP use for responding to incidents involving radioactive materials?

RAD-320. A copy of this plan is available in Region I files.

3. If the plan covers major accidents at nuclear facilities, how does it cover non-catastrophic incidents such as those involving transportation of materials?

RAD-320 does not cover accidents at nuclear facilities. Such accidents are covered by the State Radiological Emergency Preparedness Plan.

4. How does the plan define responsibilities and actions to be taken by all State Agencies (initiating response actions, operations, cleanup, etc.)?

Details are provided in the plan.

5. How does the plan provide for notification of and communications with appropriate government agencies?

Details are provided in the plan.

6. How is the response program organized so that qualified individuals are readily available through identifiable channels of communication?

The plan is designed so that appropriately trained individuals at the county and/or state level respond directly to the accident site.

7. Has the plan been distributed to all participating agencies?

Yes.

8. Has the NRC had opportunity to comment on the plan in draft form?

Yes.

9. Is the plan reviewed annually by the RCP for adequacy and to assure the content is current?

Yes.

10. Are drills performed periodically to test the plan for radioactive materials emergencies? Explain, for example, how nonroutine office hours communications are checked.

Yes. The plan has been tested several times during non-routine office hours for notification of minor incidents and has proven to be quite effective.

III A. Reviewer Assessment

The Department meets all indicator guidelines.

B. Budget (Category II)

NRC Guidelines: Operating funds should be sufficient to support program needs such as: staff travel necessary to conduct an effective compliance program, including routine inspections, followup or special inspections (including pre-licensing visits) and responses to incidents and other emergencies; instrumentation and other equipment to support the RCP; administrative costs in operating the program including rental charges, printing costs, laboratory services, computer and/or word processing support, preparation of correspondence, office equipment, hearing costs, etc. as appropriate. Principal operating funds should be from sources which provide continuity and reliability, i.e., general tax, license fees, etc. Supplemental funds may be obtained through contracts, cash grants, etc.

Questions:

1. What fiscal year is used by your State?

April 1 - March 31.

 Indicate the amount for funds obtained from each source (fees, State General funds, HHS, NRC environmental monitoring or transportation surveillance contracts, EPA, FDA and others).

Fees (X-ray program)\$ 278,899State General Funds\$ 647,871

NRC Environmental Contract\$ 70,350FDA Compliance Testing Contract\$ 65,758FDA Radiopharmaceutical Quality\$ 9,513Assurance Contract\$ 9,513Block Grant\$ 176,722

- 3. Show the total amounts assigned to:
 - a. the total radiation control program

\$1,249,113

b. the radioactive materials program.

\$ 370,524

4. What is the change in budget from the previous year and what is the reason for the change (new programs, change in emphasis, statewide reduction, etc.)?

This budget represents a slight increase over the previous year's budget. The change reflects the incorporation of the Radiologic Technology Licensure function within the program beginning January 1985.

 Describe your fee system, if you have one, and give the percentage of cost recovery. Enclose a copy of the fee schedule.

There is no fee system in effect for radioactive materials Licensing.

6. Does the RCP administer the fee system?

N/A.

- What recourse does the RCP have in the event of non-payment? N/A.
- Overall, is the funding sufficient to support all of the program needs? If not, specify the problem areas.

Yes.

III B. Reviewer Assessment

No problems were noted relating to the programs budget. The Department meets these program indicators.

C. Laboratory Support (Category II)

NRC Guidelines: The RCP should have the laboratory support capability in-house, or readily available through established procedures, to conduct bioassays, analyze environmental samples, analyze samples collected by inspectors, etc., on a priority established by the RCP. Questions:

 Are laboratory services readily available in-house or through other departments within the State organization?

All routine and non-routine laboratory work is done by the Radiological Sciences Laboratory, located in the Department's Center for Laboratories and Research.

 If services are provided by other departments, discuss the arrangements, supervision, charges and interdepartmental communications.

N/A.

- 3. If laboratory services must be provided by a non-State agency:
 - a. Discuss the contractual arrangements.
 - b. Is the party providing the service an RCP licensee?
 - c. If a State licensee provides the service or equipment, what are the costs?

N/A.

- 4. Describe the capability of the laboratory as follows:
 - a. Can it qualitatively and quantitatively analyze low-energy beta emitters?

Yes.

b. Can it qualitatively and quantitatively analyze alpha emitters?

Yes.

c. Can it selectively determine the presence and quantity of gamma emitters?

Yes.

d. Can it handle samples in any physical form - wipes, liquids, solids, gaseous?

Yes.

e. Does the lab participate in a periodic quality control program?

Yes. EPA, World Health Organization, and IAEA.

 How much time does it take to obtain the results from sample analyses on both a routine basis and on an emergency basis?

Routine sample analysis is usually complete within one week. Immediate results are available if an emergency situation occurs.

 List the number and types of laboratory instrumentation and services available.

Equipment: 4 fully-equipped wet-radiochemistry laboratories; 3 radiogas laboratories.

Counting room containing:

2 liquid scintillation counters 2 end-window gas-flow proportional counters Gamma spectrometry systems utilizing the following detectors:

2 Na1 (T1) Well 4" x 4" 1 NaI (T1) Well 2" x 2" 1 NaI (T1) Flat 4" x 4" 3 NaI (T1) Flat 3" x 3" 2 Ge (Li) Flat 105 cc 1 Ge (Li) Flat 70 cc 4 intrinsic-geranium detector 2 alpha-spectrosopy system (surface barrier) 3 radon counters 3 gas counting systems 2 thermoluminescent dosimetry systems

Services Available: electronic data processing access to Health Department VAX 780

III C. Reviewer Assessment

No problems were noted with regard to the Department's Laboratory capabilities. The Department meets these program indicator guidelines.

D. Administrative Procedures (Category II)

NRC Guidelines: The RCP should establish written internal procedures to assure that the staff performs its duties as required and to provide a high degree of uniformity and continuity in regulatory practices. These procedures should address internal processing of license applications, inspection policies and procedures, decommissioning, and other functions required of the program.

Questions:

 What procedures are established to assure adequate and uniform regulatory practices (e.g., administrative procedures, policy memos, licensing and inspection guides, escalated enforcement procedures, decommissioning procedures, etc.)?

Environmental Health Manual items are developed and distributed by the Office of Public Health to assure adequate and uniform regulatory practices.

2. To what extent are the procedures documented?

Procedures are documented as Environmental Health Manual items and contained in a handbook in the central and regional offices.

3. If the RCP has separate licensing and inspection staffs, what are the procedures used to communicate between the two staffs?

Communication between licensing and compliance staffs is achieved through frequent telephone contacts and memoranda. In addition, an annual meeting is held with central and regional office staff for open discussion of licensing and compliance program improvements and problems.

4. How are personnel kept informed of current regulatory policies and practices?

By memorandum and/or by presentations at the annual workshop.

5. If the RCP collects fees, are fee collection duties assigned to non-technical staff?

N/A.

6. How are contacts with communication media handled?

Contacts with the communications media are coordinated by the Public Affairs Group for the Health Department.

7. What procedures exist to ensure timely release of factual information on matters of interest to the public, the NRC and Agreement States?

The Public Affairs Group receives notification when a potential problem arises. Should the need for a press release arise, factual information is prepared by the technical staff and then distributed by the Public Affairs Group.

NRC and Agreement States are initially informed by telephone by RCP staff should a potential problem exist. When necessary, written follow-up occurs within approximately two weeks.

- 8. If your RCP has regional offices:
 - a. what procedures are in effect to assure the regions have complete copies of the procedures and files?

Regional office handbooks containing various program policies and procedures are distributed to all regional offices and continually updated. Copies of all licensing actions are distributed to regional offices when generated by central office. If a regional staff member is unable to locate policy/procedures and/or licensing items, a copy is immediately forwarded upon telephone request.

b. how often are periodic staff meetings held with headquarters staff?

Staff meetings are held at least annually.

c. how often are periodic visits/audits made by headquarters staff to regional offices?

Periodic visits/audits are made annually by the Division Director to discuss program goals/objectives. The Bureau Director visits/audits regional offices annually to discuss specific work plans. The Chief, Radioactive Materials Licensing Section, visits regional offices (time permitting) to assist in Broad license inspections and to evaluate inspectors.

d. how is uniformity controlled?

Uniformity is controlled by adherence to procedures outlined in Environmental Health Manual Items, periodic visits and review of regional staff by the Chief, Radioactive Materials Licensing Section, and annual staff workshop presentations and discussions, as well as review of inspection reports and letters.

e. how is supervision handled?

Regional office staff are directly supervised by the Regional Engineer.

III D. Reviewer Assessment

Coordination between Albany and the regional offices has improved since the previous review. Contacts between the Chief of the Radioactive Materials Licensing Section and the regions are more frequent as are staff meeting and management contacts. The Department meets these indicator guidelines.

E. Management (Category II)

NRC Guidelines: Program management should receive periodic reports from the staff on the status of regulatory actions (backlogs, problem cases, inquiries, regulation revisions). RCP management should periodically assess workload trends, resources and changes in legislative and regulatory responsibilities to forecast needs for increased staff, equipment, services and fundings.

Program management should perform periodic reviews of selected license cases handled by each reviewer and document the results. Complex licenses (major manufacturers, large scope -Type A Broad, or potential for significant releases to environment) should receive second party review (supervisory, committee, or consultant). Supervisory review of inspections, reports and enforcement actions should also be performed.

Questions:

 How does the staff keep program management abreast of the status of regulatory actions (such as backlog, problem cases, inquiries, and revision of regulations)?

Weekly and monthly reports.

 a. Is a periodic statistical tabulation of licenses, licensees, inspections and backlogs prepared by category?

Yes.

b. If so, specify how frequently the tabulation is prepared.

Statistical tabulation of licenses/licensees is prepared bi-annually. Statistical tabulation of inspection data is prepared quarterly.

3. How does RCP management assess workload trends and resources in order to determine future needs or the need for program changes?

The program is reviewed annually. Workload trend projections are made periodically by reviewing program data for the previous three to five years, new procedures in licensing and compliance and available resources.

4. How does the RCP management keep abreast of changes in legislative and regulatory responsibility?

Through representatives of the Division of Legal Affairs, Bureau of Legislation.

5. Discuss the procedures followed by licensing supervision or RCP management to monitor licensing quality.

A large percentage of licenses are reviewed by the Chief, Radioactive Materials Licensing Section, prior to signature and distribution. In her absence, the Bureau Director reviews and signs licenses.

Discuss the procedures used for supervisory review of inspection reports.

Inspection reports are reviewed by the Chief, Radioactive Materials Licensing Section, for quality and content. Licensing staff review inspection reports to aid in license review.

7. What license review practices are followed for unusual or complex license applications?

Unusual or complex licenses are usually reviewed by the Chief, Radioactive Materials Licensing Section. When the application exceeds the scope of licensing guides, NRC Regional Office is contacted for guidance.

 If applicable, discuss the procedures used for supervisory review of work performed by contract agencies or regional offices.

Supervisory review of regional offices is achieved through periodic visits to regional offices and accompaniment of regional office staff.

III E. Reviewer Assessment

Management of the Department's program has improved since the last review. The Department meets these indicator guidelines.

F. Office Equipment and Support Services (Category II)

NRC Guidelines: The RCP should have adequate secretarial and clerical support. Automatic typing and Automatic Data Processing and retrieval capability should be available to larger (300-400 licenses) programs. Similar services should be available to regional offices, if utilized.

1 a. In terms of the person-year/100 licenses figure, what level of secretarial/clerical support is provided?

> In Central Office, a senior typist (Grade 7) spends approximately 95% of her time providing support services to the radioactive materials licensing program. This represents 0.18 person-years/100 licenses.

b. If your program has regional office, provide the figures for the support for those offices.

For our five regional offices, the secretarial/clerical support services range from minimal to very good. On the average, this represents 0.15 person-years per 100 licenses.

Describe the ADP and word processing capabilities available to the RCP.

At the present time, license documents and all related correspondence are prepared on a Xerox 800 Electronic Typing System. The Bureau of Environmental Radiation Protection (BERP) recently received a Wang PC which will replace the Xerox system following a transition period in April/May 1985.

In addition, during 1985 it is anticipated that specific data related to radioactive materials licensing and compliance program will be stored and processed on the BERP IBM PC.

III F. Reviewer Assessment

The clerical situation in the New Rochelle office has improved somewhat since the last review in that typing services are now available, but professional staff are still required to do their own filing. Additional effort should be made in this area.

G. Public Information (Category II)

NRC Guidelines: Inspection and licensing files should be available to the public consistent with State administrative procedures. Opportunity for public hearings should be provided in accordance with UMTRCA and applicable State administrative procedure laws.

Questions:

 Are licensing and inspection files available for inspection by the public?

Yes.

2. Are medical and proprietary data withheld?

Yes.

3. What other parts, if any, are not available?

Any additional information which is deemed confidential.

 What written procedures and laws govern this? Please provide reference citations.

Article 6 of the Public Officer's Law, a copy of which is available in Region I files.

5. For mill States, are opportunities provided for public hearings in accordance with UMTRCA and applicable State administrative procedures and statutes?

N/A.

III G. Reviewer Assessment

The Department meets these indicator guidelines.

- IV. PERSONNEL
 - A. Qualifications of Technical Staff (Category II)

NRC Guidelines: Professional staff should have a bachelor's degree or equivalent training in the physical and/or life sciences. Additional training and experience in radiation protection for senior personnel should be commensurate with the type of licenses issued and inspected by the State.

Written job descriptions should be prepared so that professional qualifications needed to fill vacancies can be readily identified.

Questions:

1. Do all professional personnel hold a bachelor's degree or have equivalent training in the physical or life sciences?

Yes.

2. What additional training and experience do the senior personnel need to have in radiation protection?

Three years full-time experience in radiation protection or control including experience handling radioactive isotopes or radiation producing equipment.

3. What written position descriptions describe the duties, responsibilities and function of each professional position?

Job descriptions have been prepared for each title in the Radiological Health Specialist series. These are available in Region I files.

IV A. Reviewer Assessment

The Department meets these indicator guidelines.

B. Staffing Level (Category II)

NRC Guidelines: Staffing level should be approximately 1-1.5 personyear per 100 licenses in effect. RCP must not have less than two professionals available with training and experience to operate RCP in a way which provides continuous coverage and continuity.

For States regulating uranium mills and mill tailings, current indications are that 2-2.75 professional person-years' of effort, including consultants, are needed to process a new mill license (including insitu mills) or major renewal, to meet requirements of Uranium Mill Tailings Radiation Control Act of 1978. This effort must include expertise in radiological matters, hydrology, geology, and structural engineering.

Questions:

 Complete a table as below, listing the person-years of effort applied to the agreement or radioactive material program by individual. Include the name, position, fraction of time spent and the duty (licensing, inspection, administration, etc.).

| Name | Position | FTE% | Area of Effort |
|------|----------|------|----------------|
| | | | |
| | | | |
| | | | |
| | Т | otal | Person-Years |

This information is attached as Appendix D.

 Compute the person-year effort of person-years per 100 licenses (excluding mills and burial sites). Show calculation.

5.65 person-years/554 licenses equals 1.02 person-years/100 licenses.

Is the staffing level adequate to meet normal and special needs and backup?

Yes.

IV B. Reviewer Assessment

The Department meets these indicator guidelines.

C. Staff Supervision (Category II)

NRC Guidelines: Supervisory personnel should be adequate to provide guidance and review the work of senior and junior personnel. Senior

personnel should review applications and inspect licenses independently, monitor work of junior personnel, and participate in the establishment of policy. Junior personnel should be initially limited to reviewing license applications and inspecting small programs under close supervision.

Questions:

1. Identify the junior and senior personnel.

Junior Personnel

Steve Zobel Robert Rivera

Senior Personnel

Diane P. Dreikorn, Chief, Radioactive Materials Licensing Section

Regional Office Personnel

Rita Aldrich Gary Baker Elaine Carter Ihor Czerwinskyj Robert Middleton William O'Brien

2. a. What duties are assigned to junior personnel?

The duties of junior personnel are given in Appendix D. under the title "Senior Radiological Health Specialist".

b. Do they review applications and perform inspections independently?

Junior personnel review license applications for small-medium scope programs, and accompany regional inspectors when time permits.

3. a. What duties are assigned to senior personnel?

The duties of senior personnel are given in Appendix D. Senior personnel include Associate Radiological Health Specialists and Principal Radiological Health Specialists.

b. Do they independently review and monitor the work of junior personnel?

23

Yes.

4. Is there adequate supervisory or senior guidance and direction for junior personnel?

Yes.

 Discuss procedures established to ensure supervisory review of the licensing, inspection and enforcement functions.

All licensing, compliance and enforcement activities are monitored closely by the Chief, Radioactive Materials Licensing Section, who interacts continuously with licensing and inspection staffs and the Bureau Director.

6 a. Are RCP staff members allowed to consult or work part time for State licensees?

No.

b. If so, how are conflicts of interest avoided?

N/A.

IV C. Reviewer Assessment

The Department meets these indicator guidelines.

D. Training (Category II)

NRC Guidelines: Senior personnel should have attended NRC core courses in licensing orientation, inspection procedures, medical practices and industrial radiography practices. (For mill States, mill training should also be included.) The RCP should have a program to utilize specific short courses and workshops to maintain appropriate level of staff technical competence in areas of changing technology.

Questions:

 List all RCP personnel and the NRC training courses they have attended.

| Name of Stud | ent Co | ourse | Agency Sp | onsor | Dates |
|---------------------------|-----------|----------|-----------|------------|-------|
| | | | | | |
| | | • | | | |
| | | * | * | | |
| Information Appendix F | regarding | tra'ning | courses | is attache | ed as |

How does the RCP utilize short courses and workshops to maintain staff proficiency?

In addition to the training itemized in Appendix E, the RCP conducts at a minimum, an annual workshop for all Radiological Health Specialists during which current topics in the program and the radiological health field are discussed.

IV D. Review Assessment

The Department meets these indicator guidelines.

E. Staff Continuity (Category II)

NRC Guidelines:

Staff turnover should be minimized by combinations of opportunities for training, promotions, and competitive salaries. Salary levels should be adequate to recruit and retain persons of appropriate professional qualifications. Salaries should be comparable to similar employment in the geographical area. The RCP organization structure should be such that staff turnover is minimized and program continuity maintained through opportunities for promotion. Promotion opportunities should exist from junior level to senior level or supervisory positions. There also should be opportunity for periodic salary increases compatible with experience and responsibility.

Questions:

 Identify the RCP employees who have left the program since the last review and give the reasons for the turnovers. Also state whether the positions are presently vacant, filled (name replacement), abolished or other status.

> Bernard Heald - resigned. Position filled by Diane Dreikorn.

2. List the RCP salary schedule:

| POSITION TITLE | ANNUAL SALARY RANGE | |
|--|------------------------|--|
| Senior Radiological Health Specialist (G-18) | \$23,903-28,334 | |
| Associate Radiological Health Specialist (G-23) | \$31,074-36,440 | |
| Principal Radiological Health Specialist (G-27) | \$38,423-44,716 | |
| Director (G-31) | \$47,277-54,449 | |

 Compare your salary schedule with similar employment alternatives in the same geographical area, such as industrial, medical, academic or other departments within your State.

| New York State Department of Labor (DOL) G-18 Senior Radiophysicist | \$23,903-28,334 |
|--|-----------------|
| G-23 Associate Radiophysicist | \$31,074-36,440 |
| Broad Academic/Medical Licensed Facility Health Physics Technician | \$18,000-23,000 |
| Asst. Radiation Safety Dfficer | \$32,000-37,000 |
| Radiation Safety Officer | \$40,000-45,000 |
| Broad Academic Licensed Facility Environmental Health & Safety Specialist (PR-2) | \$15,900-37,500 |
| Director, Environmental Health & Safety (PR-3) | \$19,707-44,954 |

4. What opportunities are there for promotion within the RCP organizational structure without a staff vacancy occurring?

The Radiological Health Specialist series consists of three levels: Senior, Associate, and Principal. Due to the small number of personnel in these offices and the geographical locations of the positions, progress through the series is normally slow. Advancement within a job position, hiring rate (bottom of salary range) to job rate (top of salary range) is possible through an evaluation process. A longevity raise is possible after five years of service at the same level.

IV E. Reviewer Assessment

The Department meets these program indicator guidelines.

V. LICENSING

A. Technical Quality of Licensing Actions (Category I)

NRC Guidelines: The RCP should assure that essential elements of applications have been submitted to the agency, and which meet current regulatory guidance for describing the isotopes and quantities to be used, qualifications of persons who will use material, facilities and equipment, and operating and emergency procedures sufficient to establish the basis for licensing actions. Prelicensing visits should be made for complex and major licensing actions. Licenses should be clear, complete, and accurate as to isotopes, forms, quantities, authorized uses, and permissive or restrictive conditions. The RCP should have procedures for reviewing licenses prior to renewal to assure that supporting information in the file reflects the current scope of the licensed program. Questions:

1. How many specific licenses are currently in effect?

554.

 a. How many new licenses (not amendments in entirety) have been issued since the last review?

20.

b. How many were major licenses?

0.

3. How many specific licenses were terminated since the last review?

13.

- How many amendments were issued during the review period?
 248.
- Identify unusual or complex licenses issued since the last review, including name and license number.

None.

Note any variance in licensing policies and procedures granted since the last review.

None.

7. Do you require license applicants to submit details on their radwaste packaging and shipping procedures?

No. Radwaste packaging and shipping procedures are reviewed during site inspections.

- a. When do you require licensees to submit contingency plans?
 N/A.
 - List the licensees who have been required to submit contingency plans.

None.

9. How many prelicensing visits were made during this review period?

None.

10. What criterion does the RCP use to determine the need for a prelicensing visit?

Prelicensing visits are made when the reviewer deems it necessary. No such visits have been made since the last review as no complex licenses have been issued.

11. How do you ensure up-to-date information has been submitted prior to a license renewal?

By thorough review of the license renewal application to assure that it meets current requirements.

12. Do license files contain all necessary data required to evaluate an application prior to issuing a license?

Yes. A license is not issued until all questions are appropriately addressed.

13. Has the RCP taken any unusual licensing action with respect to licensees operating under multiple jurisdiction?

No.

14. Prepare a table as below showing the RCP's major licensees with name, number and type.

INCLUDE:

- 0 Broad (Type A) Licenses
- 0 LLW Disposal Licenses
- 0 LLW Brokers
- 0 Major Manufacturers and Distributors
- 0 Uranium Mills
- 0 Large Irradiators (Pool Type or Other)
- 0 Other Licenses With a Potential Significant Environmental Impact
- 0 Other Licensees You Consider to be "Major" Licensees

| Name | License Number | Type |
|--|-----------------------------|--|
| ALBANY REGION | | |
| Albany Medical Center NYSDH Labs/Research SUNY @ Albany RPI | 590 448 459-1 1035 | Broad A Broad A Broad A Broad A |
| BUFFALO REGION | | |
| SUNY @ Buffalo SUNY @ Buffalo SUNY @ Buffalo | 1049 1049-2 1051 | Broad A Broad A Broad A |

NEW ROCHELLE REGION

| SUNY @ Stony Brook Columbia University Memorial Sloan-Kettering New York Medical College | 455 537-3 19 1727 | Broad A Broad A Broad A Broad A |
|--|--|---|
| ROCHESTER REGION | | |
| SUNY © Brockport University of Rochester SYRACUSE REGION | 1193 436 | Broad A Broad A |
| SUNY @ Binghamton St. Lawrence University SUNY Science/Forestry Cornell University SUNY-Upstate Med. Ctr. Syracuse University | 588 1174 469 5~3A 47 40 | Broad A Broad A Broad A Broad A Broad A |

V A. Reviewer Assessment

A review of selected licensing actions is attached as Appendix F. Licensing actions for the most part were adequately supported. Some minor deficiencies were noted, however, such as missing standard conditions and inadequate supporting documentation in the following areas: facility descriptions, dose calibrator procedures, and brachytherapy procedures. One particular license application for brachytherapy uses was deficient in the lack of a number of important safety procedures. The Department has reviewed their licenses against the criteria for contingency plans. None require such plans.

B. Adequacy of Product Evaluations (Category I)

NRC Guidelines: RCP evaluations of manufacturer's or distributor's data on sealed sources and devices outlined in NRC, State, or appropriate ANSI Guides, should be sufficient to assure integrity and safety for users.

The RCP should review manufacturer's information in labels and brochures relating to radiation health and safety, assay, and calibration procedures for adequacy. Approval documents for sealed source or device designs should be clear, complete and accurate as to isotopes, forms, quantities, uses, drawing identifications, and permissive or restrictive conditions.

Questions:

 How many new and revised evaluations were made of sealed sources and devices during the review period?

Sealed source and device evaluations are performed by the New York State Department of Labor.

2. How many SS&D evaluations have been made for which approval documents have not yet been prepared?

N/A.

3. How does the RCP evaluate manufacturer's data on SS&D's to ensure integrity and safety for users?

N/A.

4. Do you determine whether the manufacturer's information on labels and brochures relating to health, safety, assay, and calibration procedures is adequate on all products?

N/A.

V B. Reviewer Assessment

N/A.

C. Licensing Procedures (Category II)

NRC Guidelines: The RCP should have internal licensing guides, checklists, and policy memoranda consistent with current NRC practice. License applicants (including applicants for renewals) should be furnished copies of applicable guides and regulatory positions. The present compliance status of licensees should be considered in licensing actions. Under the NRC Exchange-of- Information program, evaluation sheets, service licenses, and licenses authorizing distribution to general licensees and persons exempt from licensing should be submitted to NRC on a timely basis. Standard license conditions comparable with current NRC standard license conditions should be used to expedite and provide uniformity in the licensing process. Files should be maintained in an orderly fashion to allow fast, accurate retrieval of information and documentation of discussions and visits.

Questions:

 Has the RCP developed its own licensing procedures or does it use NRC guides? Please provide for review.

Yes. These guides are available in Region I files.

2. What licensing guides, checklists and policy memoranda are made available to the staff?

The following guides are available to the staff:

- i. Radiation Guide 10.1 Medical Programs.
- Radiation Guide 10.2 Academic Programs of Limited Scope.
- iii. Radiation Guide 10.3 Laboratory Programs.

30

- v. Radiation Guide 10.5 Type A Broad Licenses.
- vi. Radiation Guide 10.6 Gas Chromatography and X-ray Fluorescence Analyzers.
- vii. Radiation Guide 10.10 Decontamination of Facilities and Equipment Prior to Release of Unrestricted Use or Termination of Licenses.

License review checklists are also available.

3. What guides and/or regulatory position statements are furnished to license and renewal applicants?

As the guides are still in draft form, only portions are distributed to licensees.

 Describe the system for advising classes of licensees of new licensing procedures and regulations.

Licensees are notified of new licensing procedures and regulation changes through general mailings to those affected licensees.

5. a. How are licensing actions coordinated with the compliance staff?

Licensing staff review inspection reports for compliance staff's suggested changes needed on licenses. In addition, Licensing staff and compliance staff deal directly by telephone to discuss certain licensing actions.

b. Are licensing actions taken while enforcement action is pending?

Not a ually.

6. For what length of time are various categories of licenses issued?

Generally, license of all categories are issued for a 5-year period.

7. a. Does the RCP use standard licensing conditions?

Yes.

b. If so, how does the RCP assure they are comparable with those used by NRC?

The RCP updates standard conditions whenever a new NRC standard condition list is provided.

8. Are the licensing conditions on file in the RCP office and with NRC?

Yes.

9. What SS&D sheets, service, distribution and "E" licenses are available for RCP staff use?

The entire set of SS&D sheets provided by NRC, and service and distribution licenses issued by the New York State Department of Labor are available in the central office.

 Describe your practices for distributing SS&D sheets, as well as GL distribution and service licenses, to the NRC.

N/A.

 Describe your procedures for maintaining the license files (How are files and folders arranged? Are telephone contacts and visits documented? Who is responsible for filing materials in folders?).

License files are arranged by region, local health unit, and then alphabetically by facility name. In addition, they are cross referenced by a number and type-of-license record system. Telephone contacts and visits are documented by memo to the file. The Senior Typist for the Radioactive Materials Licensing and Compliance staff is responsible for filing licensing documents and related correspondence.

12. Are there opportunities for license reviewers to accompany inspectors?

Yes.

V C. Reviewer Assessment

The Department meets these program indicator guidelines. The draft guides are currently being reviewed and comments will be provided to the RCP.

VI. COMPLIANCE

A. Status of Inspection Program (Category I)

NRC Guidelines: The State RCP should maintain an inspection program adequate to assess licensee compliance with State regulations and license conditions.

The RCP should maintain statistics which are adequate to permit Program Management to assess the status of the inspection program on a periodic basis. Information showing the number of inspections conducted, the number overdue, the length of time overdue and the priority categories should be readily available. There should be at least semiannual inspection planning for the number of inspections to be performed, assignments to senior vs. junior staff, assignments to regions, identification of special needs and periodic status reports.

Questions:

 How is statistical information maintained about the inspection program to permit periodic assessment of its status by RCP management?

A manual log system is maintained for inspection program status. Inspection workload lists are updated monthly utilizing this log. Quarterly inspection program status charts are prepared for RCP management assessment.

Prepare a table as below, indicating the number of inspections made in the review period, by category and priority.

This inspection data is provided in Appendix G.

3. Prepare a table (or tables) as below which identifies the Priority 1, 2, and 3 licensees with overdue inspections. Include the license category, the due date, and the number of months the inspection is overdue. (If list is extensive, a comparable computer printout is acceptable.)

| PRIORITY | DATE | MONTHS |
|----------|--|--|
| I | 12/84 | 3 |
| III | 6/84 | * |
| III | 83 | |
| III | 7/83 | |
| III | 7/83 | |
| III | 8/83 | |
| III | 4/84 | |
| III | 83 | |
| III | 9/83 | |
| III | 9/84 | |
| III | 12/82 | 27 |
| II | 12/81 | 39 |
| I | 7/83 | 19 |
| I | 10/84 | 5 |
| | I III III III III III III III III III | I 12/84 III 6/84 III 83 III 7/83 III 7/83 III 7/83 III 8/83 III 8/83 III 8/83 III 9/83 III 9/83 III 9/84 III 9/84 III 12/81 I 7/83 |

| #1879 Lafayette Gen. | Group | II | 5/84 | 10 |
|--------------------------|------------|-----|-------|--------|
| #565 Genesee Co. CD | CD | III | 4/84 | |
| #1769 Batavia Equine | Vet. | 11 | 7/84 | 8 |
| #1095 Wyoming Co. CD | CD | 111 | 8/84 | |
| #1020 D. William Howard | Brachy. | II | 8/84 | |
| #1007 A. Maglione, MD | Group | II | 7/82 | 32 |
| #1010 Sherber & Blum | Group | III | 9/81 | 42 |
| #1021 N. Serlin, MD | Group | 111 | 7/83 | 20 |
| #1759 SUNY @ Purchase | Academic B | 111 | 5/83 | 22 |
| #410 Vassar College | Academic B | III | 12/84 | 3 |
| #22-2 Nassau Hospital | Group | ÎI | 3/84 | 12 |
| | Group | 11 | 9/84 | 6 |
| #435 Com. Hospital | Brachy. | ÎÎ | 9/84 | 6 |
| #435-2 Com. Hospital | Group | ÎÌ | 1/84 | 14 |
| #597-2 Franklin Gen. | | II | 9/84 | 6 |
| #597-3 Franklin Gen. | Brachy. | ÎÌ | 9/84 | 6 |
| #1003 So. Nassau C.H. | Groups | II | 9/84 | 6 |
| #1003-3 So. Nassau C.H. | Brachy. | II | 3/84 | 12 |
| #1016-2 North Shore U. | Groups | II | 3/84 | 12 |
| #1016-3 North Shore U. | Brachy. | | 9/84 | 6 |
| #1153 Central Gen. H. | Group | II | | 6 |
| #1153-3 Central Gen. | Brachy. | II | 9/84 | 4 |
| #1157 Massapequa Gen. | Group | II | 11/84 | 4 |
| #1159 Long Beach Mem. | Group | II | 11/84 | 4 |
| #1876 Long Is. Cardiac | Group | III | 11/84 | 4 |
| #1145 Tappan Zee H.S. | Irradiator | III | 3/84 | 4 |
| #405-2 Southside Hosp. | Group | II | 10/84 | 5 |
| #424-2 Rad. Health Svc. | Group | II | 10/84 | 5 |
| #455 SUNY @ St. Brook | Broad A | 1 | 5/83 | |
| #540 Brookhaven M.H. | Group I | III | 9/84 | 5 |
| #540-2 Brookhaven M.H. | Group | II | 9/84 | 5 5 |
| #540-3 Brookhaven M.H. | Brachy. | II | 9/84 | 5 |
| #575 Good Sam. Hosp. | Group | 11 | 12/84 | 3 |
| #575-3 Good Sam. Hosp. | Brachy. | II | 4/84 | 12 |
| #1124 St. John's Hosp. | Group | II | 11/84 | 4 |
| #1123-2 St. John's Hosp. | Brachy. | II | 11/84 | 4 |
| #1124-3 St. John's Hosp. | Pace. | II | 11/84 | 4 |
| #1880 Huntigton Nuc. | Group | II | 12/84 | 3 |
| #2805 Suffolk Co. CD | CD | III | 12/84 | |
| #1037-2 Arnot-Ogden | Bracy. | II | 9/84 | 6 |
| #1101-2 St. John Fish. | Academic B | III | 11/84 | 4 |
| #1193 SUC @ Brockport | Broad A | I | 6/33 | 21 |
| #1717 Bethesda Com. H. | Group | II | 9/84 | 6 |
| HIVII Dechebud com. III | al sub | | | |

- * Note: Months overdue for Civil Defense licenses not determined as source sets presently not available at the majority of facilities due to FEMA directive to leak test all Cs-137 sets.
- Prepare a table as below indicating the number of overdue license inspections for Priorities 4 through 7.

| LICENSEE | PRIORITY | MONTHS OVERDUE | |
|--------------------------|----------|----------------|--|
| #1774 Westchester Co. DH | IV | 23 | |

34

5. How are inspection schedules planned and how are the dates and personnel assignments made?

Inspection schedules are prepared by the central office according to the priority of the license and the frequency schedule contained in the Department's inspection priority system. Personnel assignments are dependent on the region which the facility is located within.

VI A. Reviewer Assessment

The 57 licenses overdue for inspection as of the time of the review represents a continued improvement in this area. 76 overdue inspections were reported during the previous review. In addition, since the Department's priority system requires more frequent inspections than under the NRC system for certain categories of licensees, the number of overdue inspections was judged to be not significant. The Department does plan to reduce this backlog further.

B. Inspection Frequency (Category I)

NRC Guidelines: The RCP should establish an inspection priority system. The specific frequency of inspections should be based upon the potential hazards of licensed operations, e.g., major processors, broad licensees, and industrial radiographers should be inspected approximately annually -- smaller or less hazardous operations may be inspected less frequently. The minimum inspection frequency should be consistent with the NRC system.

Questions:

1. Enclose a copy of the RCP's inspection priority system.

The Departments inspection priority system is attached as Appendix H.

2. Who assigns licenses to the priority categories?

The Chief, Radioactive Materials Licensing Section.

 Discuss any significant variances in the RCP's priorities from the NRC priority system.

For Research B (\leq 500 mCi total), irradiators - open source and self shielded, and teletherapy licensees, the NYSDOH inspection frequency is every four years versus the NRC schedule of every three years. For lower priority (III \pm IV) licenses the NYSDOH inspection frequency is every four to six years versus the NRC schedule of seven years.

4. Is the inspection priority system designed to assure that the more hazardous and/or complex operations are inspected at an appropriate frequency? The more hazardous/complex operation are inspected on an annual basis.

 Describe the RCP's policy for unannounced inspections and exceptions to the policy.

RAD 324 requires radioactive materials inspections to be performed unannounced whenever possible. If announced, the procedure calls for no more than two days prior notification.

6. Describe the RCP's policy for conducting follow-up inspections.

Follow-up inspections are conducted when violations noted during the previous inspection are severe enough to warrant reinspection and when the facility's written response to violations is unsatisfactory.

7. a. Does the RCP inspect out-of-state firms working in the State under reciprocity or under State licensure?

No.

b. How many reciprocity notices were received?

In 1984, 16 notices were received.

c. How many were inspected?

None.

VI B. Reviewer Assessment

No significant deficiencies were noted with regard to the Department's priority system. For Research B (\leq 500 mCi total), irradiators - open source and self shielded, and teletherapy licensees, the Department's inspection frequency is every four years versus the NRC schedule of every three years. Since the Department has not experience any particular problems with these licensees and since the reviewer could not any evidence that the three year versus the four year interval was required for public health and safety reasons, no comment or recommendation to change was offered.

C. Inspector's Performance and Capability (Category I)

NRC Guidelines: Inspectors should be competent to evaluate health and safety problems and to determine compliance with State regulations. Inspectors must demonstrate to supervision an understanding of regulations, inspection guides, and policies prior to independently conducting inspections.

The compliance supervisor (may be RCP manager) should conduct annual field evaluations of each inspector to assess performance and assure application of appropriate and consistent policies and guides.

Questions:

 a. Does the senior inspector or supervisor periodically accompany the inspectors?

Yes.

b. Are these accompaniments documented?

Yes.

 Give the number of supervisory accompaniments of inspectors since the last review meeting and identify the persons accompanied and the supervisors.

Three accompaniments with compliance staff by Diane P. Dreikorn.

| DATE | INSPECTOR | LICENSEE |
|----------------|----------------------------|---|
| 04/84 08/84 | Rita Aldrich Gary Baker | Joel Gross, MD House of Good Sam. Our Lady of Lourdes |
| 11/84 | Elaine Carter | Univ. of Rochester |

VI C. Reviewer Assessment

During this review, two State inspectors were accompanied during routine inspections of medical licensees. Elaine Carter, Associate Radiological Health Specialist, Rochester Office, inspected St. Mary's Hospital in Rochester on March 27, 1985. Rita Aldrich, Associate Radiological Health Specialist, New Rochelle Office, inspected South Nassau Communities Hospital in Oceanside, New York on March 28, 1985. In the opinion of the reviewer, both inspectors are competent to evaluate health and safety problems and to determine compliance with State regulations. During the review period, the program supervisor accompanied three inspections. Accompaniments of the other regional inspectors are planned.

D. Responses to Incidents and Alleged Incidents (Category I)

NRC Guidelines: Inquiries should be promptly made to evaluate the need for onsite investigations. Onsite investigations should be promptly made of incidents requiring reporting to the Agency in less than 30 days (10 CFR 20.403 types). For those incidents not requiring reporting to the Agency in less than 30 days, investigations should be made during the next scheduled inspection. Onsite investigations should be promptly made of non-reportable incidents which may be of significant public interest and concern, e.g. transportation accidents. Investigations should include indepth reviews of circumstances and should be completed on a high priority basis. When appropriate, investigations should include reenactments and time-study measurements (normally within a few days). Investigation (or inspection) results should be documented and enforcement action taken when appropriate. State licensees and the NRC should be notified of pertinent information about any incident which could be relevant to other licensed operations (e.g., equipment failure, improper operating procedures). Information on incidents involving failure of equipment should be provided to the agency responsible for evaluation of the device for an assessment of possible generic design deficiency. The RCP should have access to medical consultants when needed to diagnose or treat radiation injuries. The RCP should use other technical consultants for special problems when needed.

Questions:

1. How does the RCP respond to incidents and alleged incidents?

By following RAD 320, the Department's incident response plan.

 Are major incidents (10 CFR 20.403 types requiring reporting in less than 30 days) investigated on a priority basis?

Yes. The Regional Radiological Health Specialist usually conducts an investigation at the site of major incidents within 24 hours following notification.

3. Are other incidents followed up in the next scheduled inspection?

Yes. Follow-up of incidents such as diagnostic misadministrations are conducted during the next scheduled inspection.

4. Are non-reportable incidents that may be of significant public interest and concern promptly investigated?

Yes.

- 5. How many incident investigations were conducted during the review period?
 - 6.
- 6. Attach as an appendix a summary of each incident investigated. Include documentation of investigation results, enforcement action when appropriate, any reenactment and time motion studies, as well as notification of the NRC and state licensees of incident information that may have been relevant to other licensed operations.

A summary of incidents is attached as Appendix I.

7. Were any incidents attributed to generic-type equipment failure?

No.

8. What action was or would be taken by the RCP pertaining to incidents attributable to generic equipment failures in regard to notification of the NRC, other licensees and the regulatory agency which approved the device?

If the potential of a generic-type equipment failure is suspected, the RCP will notify the NRC Region I representative immediately by telephone and follow-up documentation will be provided. If a generic-type equipment failure is determined, affected licensees and the regulatory agency approving the device is notified through a Information Notice mailing.

9. If a failure should occur in equipment manufactured by a RCP licensee, what action would be taken to:

The New York State Department of Labor would be notified immediately as this type of activity would fall under their jurisdiction.

10. When are other RCP licensees and the NRC notified of pertinent information about an incident?

When an incident has the potential of causing a significant public health hazard, State licensees and NRC receive written notification.

11. a. Are medical consultants available and used when necessary?

Although no formalized agreement with medical consultants to diagnose or treat radiation injury exists, expertise is available in New York State should the need arise.

b. Is the State aware of the availability of medical consultants from NRC?

Yes.

12. Explain any use of other technical consultants for special problems encountered in incident investigations.

No additional technical consultants were used during the review period. However, technical consultants from Oak Ridge National Laboratory, Brookhaven National Laboratory, and New York University Medical Center may be called upon for their expertise when special problems are encountered during investigations.

13. Were there any incidents since the last review meeting that met Abnormal Occurrence Report (AOR) criteria?

Yes, the EAD incident in Tonawanda, New York, April 1984.

VI D. Reviewer Assessment

The Department meets these indicator guidelines. Although EAD was not a licensee of the State Department of Health, the Department has been actively involved in the investigation of the incident and especially in the analysis of clean-up of the landfill and incinerator. Department personnel chaired the Governor's Ad Hoc Committee on the incident and have been negotiating with a consultant, ENSA, Inc., regarding the clean up. The New York Legislature recently appropriated \$500,000 to assist the Town of Tonawanda in the clean up of the town's landfill and sewage treatment plant incinerator. The State Department of Environmental Conservation will disperse these funds.

E. Enforcement Procedures (Category I)

NRC Guidelines: Enforcement Procedures should be sufficient to provide a substantial deterrent to licensee noncompliance with regulatory requirements. Provisions for the levying of monetary penalties are recommended. Enforcement letters should be issued within 30 days following inspections and should employ appropriate regulatory language clearly specifying all items of noncompliance and health and safety matters identified during the inspection and referencing the appropriate regulation or license condition being violated. Enforcement letters should specify the time period for the licensee to respond indicating corrective actions and actions taken to prevent re-occurrence (normally 20-30 days). The inspector and compliance supervisor should review licensee responses. Licensee responses to enforcement letters should be promptly acknowledged as to adequacy and resolution of previously unresolved items. Written procedures should exist for handling escalated enforcement cases of varying degrees. Impounding of material should be in accordance with State administrative procedures. Opportunity for hearings should be provided to assure impartial administration of the radiation control program.

Questions:

Describe the State's enforcement procedures.

The Department's administrative rules and regulations regarding enforcement procedures are available in Region I files. These rules and regulations cover the powers and duties of the Administrative Tribunal which can hold hearings, issue orders, impose fines and other penalties including license suspension or revocation.

If the RCP can apply civil penalties, explain the procedures for keying monetary penalties to violations.

Sections 12, 12-6, 206-4 (c), and 229 of the Public Health Law provide civil penalties up to \$1,000 per violation of the

Sanitary Code and criminal penalties of up to \$2,000 and/or imprisonment up to one year for each violation of the Sanitary Code.

The Department's usual enforcement procedure, the Administrative Tribunal, involves civil penalties only. The alleged violator is sent a Stipulation Offer. The Stipulation Offer, offers the alleged violator a reduced penalty of \$250 per violation if the alleged violator pleads guilty and agrees to correct any violations of the Code within a certain time period. Administrative Tribunal Hearing Officers have usually reduced the penalty to \$100 per violation if there is conclusive evidence that all violations cited on the AT-10 have been corrected before a decision in the case is rendered.

3. Describe the RCP's provisions for criminal penalties.

State Law provides for criminal penalties of up to \$2,000 and/or imprisonment up to one year for each violation of the Sanitary Code.

 Describe the policies in effect for issuing field forms equivalent to NRC form 591 or letters for enforcement action.

Enforcement letters are issued in all cases.

 Are there written procedures for handling escalated enforcement cases? Please provide for review.

See response to question E.1. above.

6. Can the State issue Orders, including Emergency Orders?

Yes. Action can be taken under a Commissioner's Order to be followed by a hearing within 15 days.

7. Can the RCP impound radioactive material?

Yes, but only if the material presents a public health hazard.

8. Do RCP administrative procedures permit the opportunity for hearings in major enforcement cases?

Yes.

9. If during the review period the RCP has issued orders, applied civil penalties, sought criminal penalties, impounded sources, or held a formal enforcement hearing, identify these cases and enclose copies of the pertinent State enforcement correspondence or orders.

| NAME OF LICENSEE | LICENSE NUMBER | TYPE OF ENFORCEMENT ACTION | DATE OF ACTION |
|---------------------|-------------------|--|-------------------|
| Joel Gross, MD | 1895 | Administrative Tribunal Hearing & Stipulation | 5/29/84 |
| Rodolfo Byrne, MD | 1819 | Administrative Tribunal Hearing & Stipulation | 7/10/84 |

Further information on these cases is provided in Appendix J.

- Are enforcement letters issued within 30 days of the inspection? Yes.
- 11. Are enforcement letters written in regulatory language and reference regulations and license conditions?

Yes.

12. Do the enforcement letters clearly differentiate between noncompliance items and health and safety recommendations?

Yes.

13. If applicable, do the letters separate actions subject to the State radiation control act and State OSHA regulations?

N/A.

- 14. a. Are enforcement letters issued by inspectors or supervisors? Enforcement letters are issued by regional inspectors.
 - b. If issued by inspectors do they undergo supervisory review prior to dispatch?

In most cases, no. For new inspectors performing radioactive materials inspections, correspondence is reviewed by the Chief, Radioactive Materials Licensing Section for approximately 6 - 12 months.

 Do enforcement letters require the licensee to respond within a stated time period? Note the period.

Yes. 30 days.

16. a. Are licensee's responses to enforcement letters reviewed by the inspector and the supervisor?

Yes.

42

b. Are they acknowledged properly?

Yes.

17. Has the RCP taken escalated enforcement action against licensees who operate in multiple jurisdictions?

No.

VI E. Reviewer Assessment

The Administrative Tribunal procedure has been an effective one for the Department and it is anticipated that the RCP will use this enforcement procedure more frequently in the future. Further information is provided in the Reviewer Assessment section of VI.G.

F. Inspection Procedures (Category II)

NRC Guidelines: Inspection guides, consistent with current NRC guidance, should be used by inspectors to assure uniform and complete inspection practices and provide technical guidance in the inspection of licensed programs. The NRC Agreement States Guides may be used if properly supplemented by policy memoranda, agency interpretations, etc. Written inspection policies should be issued to establish a policy for conducting unannounced inspections, obtaining corrective action, following up and closing out previous violations, assuring exit interviews with management, and issuing appropriate notification of violations of health and safety problems. Procedures should be established for maintaining licensees' compliance histories. Oral briefing of supervision or the senior inspector should be performed upon return from nonroutine inspections. For States with separate licensing and inspection staffs, procedures should be established for feedback of information to license reviewers.

Questions:

 Has the RCP developed its own inspection guides or does it use NRC guides?

NRC inspection guides are distributed to regional inspectors for their reference.

 Are current copies of the internal inspection forms and guides on file in the RCP office and with NRC? Attack any changes or guides developed since the last review.

Inspection forms are available in Region I files.

3. Are inspectors furnished copies of inspection guides?

Yes.

 Discuss the use or non-use of inspection policy memoranda, interpretations, etc., to supplement inspection guides.

Memoranda related to inspection policies and procedures are distributed periodically to all regional inspection staff.

- 5. Are there written procedures establishing policy for:
 - a. unannounced inspections?

Yes.

b. obtaining corrective action?

Yes.

c. following-up and closing out previous citations of violations?

Yes.

- d. exit interviews with management?
- Yes. e. issuing notices of violations and findings of health and safety problems?
- Yes. f. categorizing the seriousness of violations?

No.

Please provide copies of these procedures for review.

6. What procedures have been established for maintaining licensee's compliance histories?

By maintaining a copy of the inspection report and subsequent correspondence in the license file.

7. Does the senior inspector or supervisor orally debrief the inspector upon return from inspections?

In most cases, no. In the regional offices it is the senior inspectors who perform radioactive materials inspections. If a serious problem is noted during inspection, telephone contact is made with either the Bureau Director or Chief, Radioactive Materials Licensing Section.

8. What procedures are there for providing feedback from inspectors to licensing? Licensing staff review the most recent inspection report when reviewing a facility's license. In addition, frequent telephone contacts are made between licensing and compliance staffs to discuss pending licensing actions or problems noted during inspections.

VI F. Reviewer Assessment

The Department meets these indicator guidelines.

G. Inspection Reports (Category II)

NRC Guidelines: Findings of inspections should be documented in a report describing the scope of inspections, substantiating all items of noncompliance and health and safety matters, describing the scope of licensees' programs, and indicating the substance of discussions with licensee management and licensee's response. Reports should uniformly and adequately document the results of inspections and identify areas of the licensee's program which should receive special attention at the next inspection. Reports should show the status of previous noncompliance and the independent physical measurements made by the inspector.

Questions:

 How do inspection reports document the inspection that was conducted and the inspection findings? Explain how the reports substantiate noncompliance and health and safety matters and describe the scope of the licensee's program.

The inspector completes the appropriate inspection form to document the inspection, scope of the program reviewed, and noncompliance items noted. Specific examples of activities noted are used to substantiate noncompliance items and health and safety matters.

- 2. Do the reports
 - a. relate the discussions held with license management and interviews with workers?

Yes.

b. include independent measurements conducted by the inspector?

Yes.

c. document follow-up of previous citations of violations made by the inspector?

Yes.

d. identify areas of the licensee's program needing special attention at the next inspection?

Yes.

3. Are inspectors routinely inspecting radwaste package preparation and shipping practices and do the reports document the results?

Yes, but the majority of facilities now have inhouse decay programs.

VI G. Reviewer Assessment

A review of selected compliance files is attached as Appendix K. The review of a number of enforcement letters revealed that in some cases, violations of regulations or license conditions were addressed as recommendations rather than cited as items of noncompliance. Two other cases were noted where the State could have taken stronger enforcement action. In the first case involving a type C broad academic license in the Buffalo area, the licensee has had a poor compliance record for 10 years, with continuing repeat violations. The second case involved a medical licensee in the New Rochelle region where numerous violations, some of which were addressed as recommendations rather than items of noncompliance, were contested by the licensee. Although the Department plans escalated enforcement action in this case, the delay in taking such action may have weakened the State's case.

In the past, inspection reports did not always receive management review in Albany on a timely basis. Although recent cases have shown improvement in this area, program management needs to monitor supervisory review of these reports to assure that they continue to to conducted on a timely basis. Inspection reports did not always provide adequate documentation to support items of noncompliance. For example, some reports contained statements to the effect that certain records were "incomplete" without providing details as to what specific information was missing. The State has on occasion cited licensees for failure to keep exposures as low as reasonably achievable (ALARA); however, all inspection reports do not always indicate the status of the licensee's ALARA program.

H. Independent Measurements (Category II)

NRC Guidelines:

Independent measurements should be sufficient in number and type to ensure the licensee's control of materials and to validate the licensee's measurements. RCP instrumentation should be adequate for surveying license operations (e.g., survey meters, air samplers, lab counting equipment for smears, identification of isotopes, etc.). GM Survey Meter: 0-20 mr/hr Ion Chamber Survey Meter: several r/hr Neutron Survey Meter: Fast & Thermal Alpha Survey Meter: 0-100,000 c/m Air Samplers: Hi and Low Volume Lab Counters: Detect 0.001 uc/wipe Velometers Smoke tubes Lapel Air Samplers

Instrument calibration services or facilities should be readily available and appropriate for instrumentation used. Licensee equipment and facilities should not be used unless under a service contract. Exceptions for other State Agencies, e.g. a State University, may be made. Agency instruments should be calibrated at intervals not greater than that required to licensees being inspected.

Questions:

 Discuss the RCP's policy for conducting independent measurements as a part of each inspection (e.g., air samples, wipe samples, air flows, dose rates). Are these measurements documented in the inspection report?

Dose rates and wipe samples are routinely obtained during an inspection. The results are documented in the inspection report. If wipe samples are sent to the Center for Labs and Research for analysis, a report of results is usually received by the inspector and central office within one week.

 List the instrumentation that is readily available to the RCP for surveying licensed operations and conducting appropriate independent measurements.

The list of available instrumentation is available in Region I files.

 Describe the method used for calibrating survey instruments and the frequency of calibration.

ANSI standard N323 - annual calibration.

VI H. Reviewer Assessment

The Department meets these indicator guidelines.

VII. OTHER ASPECTS OF THE STATE'S RADIATION CONTROL PROGRAM

A. Non-Agreement Sources of Radiation

Questions:

 Are the licensing and inspection procedures for NARM the same as for agreement materials?

Yes.

 Give the number of X-ray machine (or tube) and accelerator registrants by category, e.g., dental, medical, industrial, etc.

Machine registration data is attached as Appendix L.

3. How many machine and accelerator inspections were made in the last year (or other appropriate interval)?

Machine inspection data is also included in Appendix L.

4. Does the RCP license X-ray or nuclear medicine technologists?

Yes. State licensure for radiological technologists exists.

- VII A. Reviewer Comment: None.
 - B. Environmental Monitoring Program

Questions:

 To indicate the scope of the environmental monitoring program, describe:

A description of the Department's Statewide sampling program is attached as Appendix M.

Is a copy of the latest environmental surveillance report available for review?

The 1984 Environmental Surveillance Report is currently being prepared.

- VII B. Reviewer Comment: None.
 - C. Other Areas

This section of the review is for the use of either the reviewer or the RCP to address issues pertaining only to the individual State, to new areas of concern, or to generic or State-specific issues raised by NRC staff.

1. Other Generic Issues

48

Questions:

a. For radiography inspections, to what extent do you make inspections at temporary job sites?

N/A.

b. Are you firding Ir-192 contamination on radiographic equipment?

N/A.

c. what are the State's plans to adopt the low-level waste (LLW) manifest rule (if not already adopted)?

Revision of 10 NYCRR includes the LLW manifest rule.

d. For itates with LLW disposal sites, what are the State's plans to implement 10 CFR 61?

N/A.

e. Will your State have access to a LLW disposal site after January, 1986. If not, what contingency plans are there for after January, 1986?

No. Legislation is currently being proposed for development of temporary above-ground storage facilities at West Valley.

f. Have copies of 10 CFR 61 and NRC technical positions on waste form and classification been distributed to State licensees? If there has been feedback please provide documentation.

Yes. No feedback was received from licensees. Most facilities have instituted in-house decay programs for short-lived materials.

g. Have there been any applications or approvals for incineration, compacting or disposal?

No.

h. What use is being made of IE information notices?

Distribution to applicable licensees and compliance staffs promptly when received.

i. Identify any group of materials licenses for which the RCP has increased frequency of inspection due to problems with that general category. Please discuss the nature of those problems.

None.

j. With respect to medical licensees, is the RCP making any effort during inspections of nuclear pharmacies to determine whether the licensee is actually conducting the required molybdenum breakthrough tests, i.e., what is the RCP doing in addition to record reviews to establish compliance or noncompliance with the requirement?

Only 2 nuclear pharmacies are in the NYS Department of Health jurisdiction. Records are reviewed for molybdenum breakthrough checks, in addition to observing procedures as they are performed at the facility.

k. Is the RCP mounting any special effort to look at the possibility of reconcentration of radionuclides in sanitary sewers and sewage treatment plants as part of the regular inspection program? If so, please describe.

Yes. We plan to require facilities that discharge alpha emitters and Type A Broad licensees to perform annual sampling of sediments of effluent solids from their facility at the nearest accessible point and the final solid output, whether sludge or ash, from the sewage treatment plant. Facilitites will be required to analyze samples for all radionuclides discharged through their sanitary sewer system.

LIST OF APPENDICES

| Appendix | A | - | NRC Chronology of Amendments |
|----------|---|---|--|
| Appendix | В | - | Organization Charts for Department of Health |
| Appendix | С | - | Organization Chart for RCP |
| Appendix | D | - | Staffing Data |
| Appendix | E | - | Training Information |
| Appendix | F | - | Review of Selected Licensing Actions |
| Appendix | G | - | Inspection Data |
| Appendix | н | - | Inspection Priority System |
| Appendix | I | - | Summary of Incidents |
| Appendix | J | * | Enforcement Cases |
| Appendix | К | - | Review of Selected Compliance Files |
| Appendix | L | - | Machine Registration and Inspection Data |
| Appendix | М | | Environmental Monitoring Program |



UNITED STATES NUCLEAR REGULATORY COMMISSION WASHINGTON, D. C. 20555

CHRONOLOGY

Amendments to be Considered by Agreement States (from September 1971)

| | | Cussested State | |
|----------------|-----------------------------|---|---|
| Effective Date | 10 CFR Part | Suggested State Regulations | Summary |
| Sept. 24, 1971 | 20 30 | Part C, Sch. B Part D, App. B | Addition of an exempt quantity for Ba-133. |
| March 26, 1972 | 20 30 40 70 71 | A.3 C.40 C.100 D.207 | Addition and modifica- tion of transport and packaging procedures. |
| Nov. 2, 1972 | 20 | Part D, App. A | Changes in values of radionuclides of all concentrations in air and water. |
| Sept. 17, 1973 | 19 | Part J | Requirements for notices, instructions and reports by licensees to workers, and options available to workers with regard to inspections. |
| Oct. 24, 1973 | 20 30 32 | A.2(i)c Part B, Sch. A Part D, App. A and App. B | Change to abbreviations for "curie" and "micro- curie," and addition of definition for "milli- curie." |
| Jan. 10, 1974 | 31 32 | C.22(i) C.28(h) | Authorization to use C-14 in in vitro clinical or laboratory tests. |
| March 11, 1974 | 30 31 40 70 150 | C.40 | Requirement that suppliers must verify that customers are authorized to receive the material shipped. |
| July 29, 1974 | 30 | A.2(i) Part D, App. A | Special curie definitions and concentration values for U and Th. |

| ective Date | 10 CFR Part | Suggested State Regulations | Summary |
|--------------|---|--|--|
| 16, 1974 | 31 32 35 | C.22(h) C.26(c) C.28(h) C.28(j) | Addition of H-3 and Fe-59 to in vitro tests and extension of Medical Group licensing. |
| . 15, 1975 | 31 32 | C.22(d) C.28(d) | Modification of require- ments for distribution of 31.5 GL devices. |
| . 19, 1975 | | A.3(c) | Clarification of AEC contractors exemption pursuant to Energy Reorganization Act. |
| te 25, 1975 | 20 | D.206 | Requirements for control of licensed material in unrestricted areas and not in storage. |
| ∵e 25, 1975 | 35 | Part C, Sch. C | Addition of I-125 seeds for interstitial treat- ment of cancer to Group VI. |
| . 19, 1976 | 20 | D.1(a) | Incorporation of "As Low As Is Reasonably Achievable (ALARA)" wording. |
| 29, 1976 | 20 | Part D, App. A | Modification of occupa- tional exposure limit for Rn-222. |
| . 23, 1976 | 35 | Part C, Sch. C | Addition of Sn-113/ In-113m generators to Group III. |
| -11 19, 1976 | 35 | Part C, Sch. C | Addition of Yb-169 DTPA for cisternography to Group II. |
| ·∈ 2, 1976 | 20 31 32 34 40 70 150 | Parts C, D and E | Requirements for preservation of certain records required by the regulations. |

-2-

| fective Date | 10 CFR Part | Suggested State Regulations | Summary |
|--------------------------|-----------------------|--------------------------------|--|
| Aug. 4, 1976 | 34 | E.203 | Personnel monitoring ${\cal H}^{\prime\prime}$ requirements for industrial radiographers. |
| Aug. 16, 1976 | 35 | Part C, Sch. C | Addition of I-125 Yes fibrinogen for detection Nov. Er of deep vein thrombosis Groupist to Group II. |
| Dec. 29, 1976 | 20 .103 (C) | D.103 | Authorizes use of respirators. Bases internal exposure limits on intake into the body. |
| Jan. 5, 1977 | 40 | C.21(d) | Establishes GL for <u>NO</u> depleted uranium products. |
| March 7, 1977 | 40 | C.3(c) | Exemption for personnel 16-3.100 neutron dosimeters containing thorium. |
| 'ay 31, 1977 | 31 32 | C.22(i) C.28(h) | Addition of Se-75 to in July 79 vitro GL. Taure 6 |
| June 27, 1977 | 31 32 | C.22(i) C.28(h) | Addition of Mock Iodine- Rev 125 calibration sources 76-3.701 (7) to <u>in vitro</u> GL. |
| Aug. 15, 1977 | 35 | С.26(Ь) | Modification of requirements for indivi-July 79 dual physician use of 16.121 radioactive material for human use. |
| Jan. 6, 1978 | 40 | C.21(a) | Extends small quantity Rev source material GL to 16-3.101 Federal, State and local 9 governments for operational purposes. |
| Jan 16, 1978 | 35 | Part C, Sch. C | Addition of Tc-99m human serum albumin for heart Nov.81 blood pool imaging to Group III. |
| ⁻ eb. 7, 1978 | 35 | Part C, Sch. C | Addition of Tc-99m Nov 81 medronate sodium for bone imaging to Group III. |

-3-

| fective Date | 10 CFR Part | Suggested State Regulations | Summary |
|--------------|----------------|--------------------------------|---|
| co 16, 1978 | 30 | C.4(c) | Exemption for spark gap $\frac{1}{100}$ irradiators containing $\frac{1}{100}$ |
| 14, 1978 | 20 | D.203(c) | Additional requirements for controlling areas in July 70 which radiation levels in excess of 500 rems/hr 16 12/612 exist. |
| une 16, 1978 | 35 | Part C, Sch. C. | Addition of Tc-99m gluceptate sodium for brain and renal Nov ² perfusion imaging to Group III. |
| ine 23, 1978 | 20 | D.203(f) | Removal or defacing of radioactive material in product labels on empty 16.10 containers. |
| zpt. 7, 1978 | 35 | Part C, Sch. C | Addition of Tc-99m human serum albumin micro- spheres for venography to Group III. |
| | 35 | G.Ž(c) | Requirement to perform fev survey of patients to 16-3.201 confirm that implants c)3 have been removed. |
| | 35 | Part C, Sch. C | Deletion of diagnostic No procedures from medical groups. |
| ane 5, 1979 | 30 40 70 | C.31(d) | Notice of discontinued Juny 79 licensed operations. 16,10% |
| iy 9, 1979 | 35 | G.3(d),(e), (f),(g),(h) | Teletherapy calibrations / Pev (d.(e)(-))9. |
| .ş. 20, 1979 | 19 20 | D.1, D.101, D.102 J.13 | Control of radiation to transient workers. |
| 1979 | 71 | C.100 | Modification of transportation require- ments. transfer of the for transport - lie ing |

-4-

| | Effective Date | 10 CFR Part | Suggested State Regulations | Summary |
|---|----------------|---------------|--|--|
| | March 3, 1980 | 34 | Part E C.26(e) | Amendments to industrial $^{\prime J}\!/_{\rm A}$ radiography requirements. |
| | March 28, 1980 | 71 | A.3(b) C.101 | Correction to reference to Postal Service regulations. |
| | Sept. 2, 1980 | 35 | C.26(c) | Testing of radioisotope LC. Cond, generators. |
| | Sept. 19, 1980 | 40 | C.21(a) | Deletion of GL for Rev source material 163/01 (f) medicinals. |
| ę | Nov. 10, 1980 | 35 | D.409 | Medical mis> Put Herapy administration reporting.un.Rev. |
| | Nov. 17, 1980 | 40 | A.2 C.25(e),(f), (g),(h) C.29 Part C, Sch. E | Requirements to implement the Uranium Mill Tailings N/A Act. |
| | Dec. 1, 1980 | 20 | D.106(g) | Reference to 40 CFR 190 Normalist for uranium fuel cycle operations. |
| | Jan. 28, 1981 | 20 | D.304 | Deletion of waste burial $Re_{3.304}^{V}$ authorization. 16.3 |
| | March 6, 1981 | 35 | Part C, Sch. C | Addition of Tc-99m oxidronate sodium to Group III. |
| | March 13, 1981 | 34 | E.203(b) | Disposal of dosimeter Nite records. rad ographers |
| | March 31, 1981 | 20 | D.306 | Biomedical waste rule - Cripstke |
| | May 13, 1981 | 30 | C.4(c) | Exemption for survey instrument calibration FeV 100 sources. 16-3.100 |
| | Sept, 23, 1981 | 30.15 10 9 | C.4(c) | Addition of Am-241 to exemption for survey instrument calibration sources. 0 25 46 |

2V

1

| Effective Date | 10 CFR Part | Suggested State Regulations | Summary July 17 |
|----------------|----------------|--------------------------------|--|
| Nov. 30, 1981 | 20 | D.201 | Radiation protection / 16.10 survey requirement. |
| Dec. 24, 1981 | 40 | C.3(c)(6) | Clarification of exemption for uranium ReV shielding in shipping containers. |
| March 26, 1982 | 35 | Part C, Sch. C | Addition of Tc-99m labeled disofenin to <br Group III. |
| April 15, 1982 | 20 | D.103 | Placement of provisions of Reg. Guide 8.15 in Respiretory regulations. |
| June 29, 1982 | 35 | Part C, Sch. C | Addition of Tc-99m labeled succimer to Group III. |
| July 6, 1982 | 71,97 | C.104 | Advance notification of Red transport of waste. |
| Sept. 13, 1982 | 35 | C.26(a) | Change medical isotope for the safety committee. Change for the safety committee. |
| Jan 26, 1983 | 61 | Part M D.307 61.3 61.55 | Licensing requirements N/A for land disposal of radioactive waste, and waste classification. Red 16 309 |
| Dec. 27, 1983* | 20 | D.311 | Transfer for disposal Kev and manifests. 16-3.308 |
| March 4, 1983 | 35-25 35 26 | G.4(h),(i) | Teletherapy room - Cond. monitors and servicing of source exposure and ra mechanisms 16,122, g. |
| March 7, 1983 | 35.14 (5)6 | C.26(c) | Exemption from require- ments for use of approved radiopharmaceuticals for is- unapproved procedures. |
| | | | |

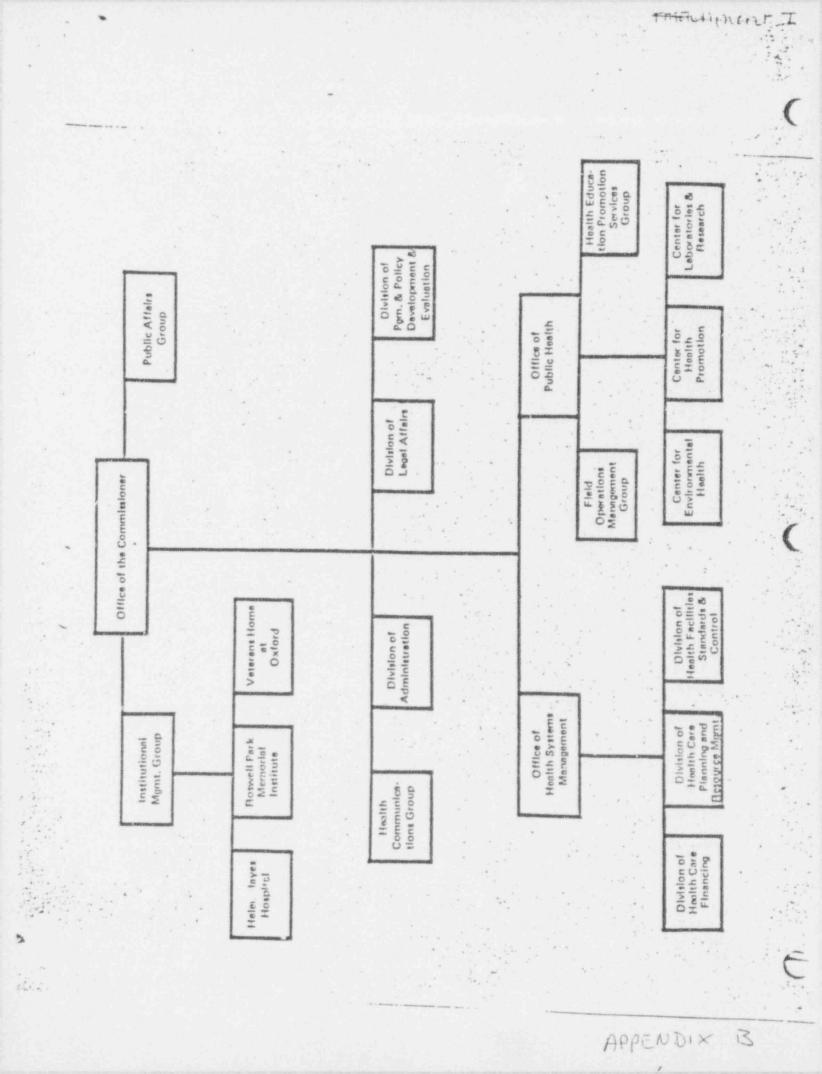
1

*Published in conjunction with Part 61.

1 - -

-5-

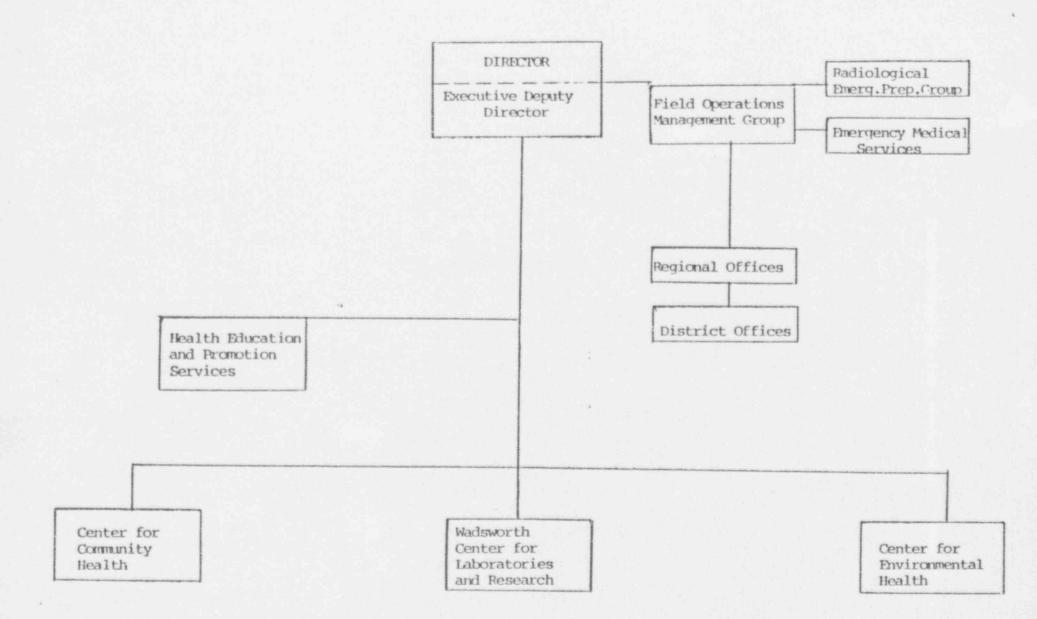
| Effective Date | 10 CFR Part | Suggested State Regulations | Summary |
|----------------|-----------------|--------------------------------|---|
| June 28,1983 | 35 | Part C, Sch. C | Addition of I-125 sealed source in portable device to Group VI. |
| Aug. 15, 1983 | 30 40 70 | C.32 | Expiration and July 79 + EL 108 termination of 16-3.108 licenses. |
| Sept. 6, 1983 | 71 | Part T (Proposed) | Transportation regs (16.3-400) IAEA. |
| Sept. 28, 1983 | 30 70 150 | W.501 | Irretrievable well N/A logging source. |
| Sept. 11, 1984 | 40 | c.3 (c) | Elimination of exemption for glass enamel and glass enamel frit. Rev. |



January, 1985

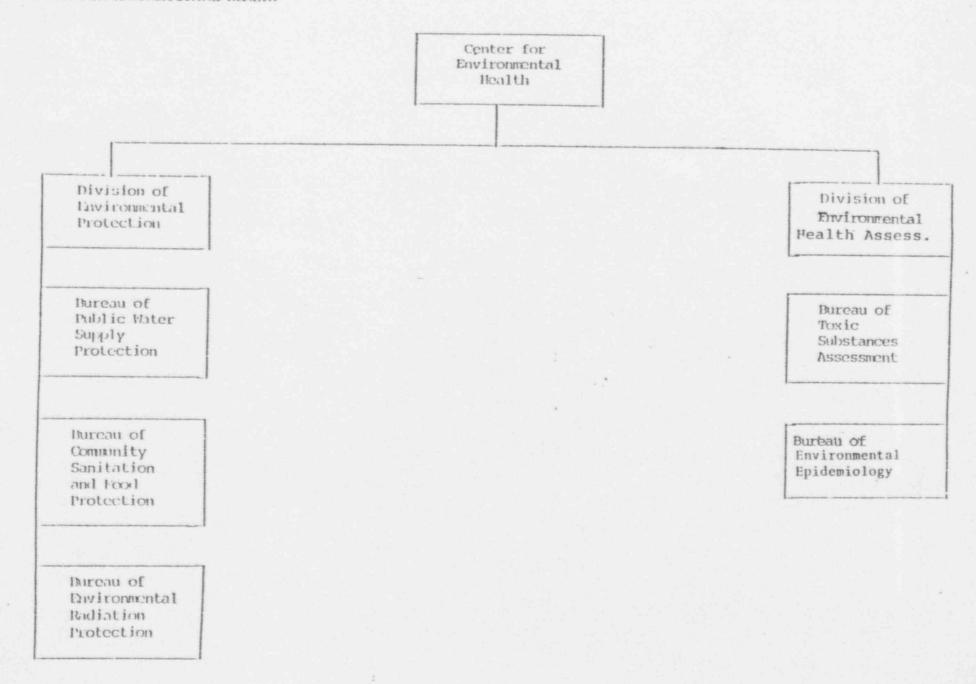
6. 6

NEW . STATE DEPARTMENT OF HEALTH OFFICE OF PUBLIC HEALTH



MIM . STATE DEPARTMENT OF HEALTH OTTIC: PUBLIC HEALTH CIMER FOR DIMINORUMFAL HEALTH

January, 1985



BUREAU OF ENVIRONMENTAL RADIATION PROTECTION

Office of the Director: Karim Rimawi, Ph.D., Director (G-64) Toni Walsh, Health Program Aide (G-11) Linda Branch, Sr. Stenographer (G-9)

Environmental Radiation Section

William Condon, Chief (G-27) Princ. Radiological Health Spec.

James Huang (G-22) Nesearch Scientist II

Robert Alibozek (G-23) Assoc. Radiological Health Spec.

Nobert Wigley (G-15) Engineering Technician

Robert Bochniewicz (G-12) Electronic Equipment Mechanic

*Dorothy Meicht (G-5) Stenographer

**Stenographer (G-5)

*40%

Radioactive Materials Licensing Section

Diane Dreikorn, Chief (G-27) Princ. Radiological Health Spec.

Steven Zobel (G-18) Senior Radiological Health Spec.

Robert Rivera (G-18) Senior Radiological Health Spec.

Patricia Nicholas (G-7) Senior Typist

Radiation Equipment Section

Maryanne Harvey, Chief (G-27) | Princ. Radiological Health Spec.

Thomas Miller (G-23) Assoc. Radiological Health Spec.

George Kerr (G-18) Senior Radiological Health Spec.

Douglas Keith (G-18) Senior Radiological Health Spec.

John O'Connell (G-18) Senior Radiological Health Spec.

e Atten

Catherine Nava (G-7) Senior Clerk

(G-3) Typist

Helen Hart (G-3) Typist Radiologic Technology Section

Alan Cohen (G-23) Assist. Dir. of Rad. Technology

John Tedesco (G-17) Senio: Investigator

Julie Hourigan (G-9) Senior Stenographer

Lillian Carpenter (G-5) Stenographer

Field Roster

Albany Regional Office

Robert Middleton - Associate Radiological Health Specialist Vacant - Associate Radiological Health Specialist

Buffalo Regional Office

William O'Brien - Associate Radiological Health Specialist Ferenc Tibold - Senior Radiological Health Specialist Barbara Ignatz - Senior Radiological Health Specialist

New Rochelle Regional Office

Ihor Czerwinskyj - Senior Sanitary Engineer Rita Aldrich* - Associate Radiological Health Specialist

Rochester Regional Office

Elaine Carter - Associate Radiological Health Specialist Larry Rawa - Senior Radiological Health Specialist

Syracuse Regional Office

Gary Baker - Associate Radiological Health Specialist Vidya Goyal - Senior Radiological Health Specialist

1

*Compliance Contract

BUREAU OF ENVIRONMENTAL RADIATION PROTECTION

PROFESSIONAL STAFF

| | | | % OF TIM | |
|-------------------|---|-------|----------|---|
| NAME | TITLE | GRADE | IN RM | ACTIVITY |
| Karim Rimawi | Director | G-31 | 20 | Administration |
| William Condon | Principal Radiological Health Specialist | G-27 | 5 | Administration |
| Maryanne Harvey | Principal Radiological Health Specialist | G-27 | 0 | |
| Diane Dreikorn | Principal Radiological Health Specialist | G-27 | 90 | Administration Licensing Compliance |
| Thomas Miller | Associate Radiological | G-23 | 0 | compriance |
| James Huang | Health Specialist Research Scientist II | G-22 | 0 | |
| Robert Alibozek | Associate Radiological Health Specialist | G-23 | 0 | |
| Douglas Keith | Senior Radiological Health Specialist | G-18 | 0 | |
| George Kerr | Senior Radiological Health Specialist | G-18 | 0 | |
| John O'Connell | Senior Radiological Health Specialist | G-18 | 0 | |
| Steve Zobel | Senior Radiological Health Specialist | G-18 | 95 | Licensing |
| Robert Rivera | Senior Radiological Health Specialist | G-18 | 100 | Licensing |
| William Wigley | Principal Engineering Technician (APC) | G-15 | 0 | |
| Robert Bochnewicz | Electronic Equipment Mechanic | G-12 | 20 | Equipment Maintenance |
| | STENOGRAPHIC STAFF | | | |
| Linda Branch | Senior Stenographer | G-9 | 0 | |
| athy Nava | Senior Clerk | G-7 | 0 | |
| Patricia Nicholas | Senior Typist | G-7 | 90 | |
| D. Meicht | Stenographer | G-5 | 0 | |
| Helen Hart | Typist | G-3 | 0 | |
| Cubil Cohaub | Tvpist | G-3 | 0 | APPENDIX |

AREA/REGIONAL OFFICES

| | | | % OF TIME | |
|----------------------|---|-------|-----------|------------|
| NAME/REGIONAL OFFICE | TITLE | GRADE | IN RM | ACTIVITY |
| Albany Office | | | | |
| Robert Middleton | Associate Radiological Health Specialist | 6-23 | 40 | Compliance |
| Vacant | Associate Radiological Health Specialist | G-23 | 0 | |
| Buffalo Office | | | | |
| William J. O'Brien | Associate Radiological Health Specialist | G-23 | 30 | Compliance |
| Barbara Ignatz | Senior Radiological Health Specialist | G-18 | 0 | |
| Ferenc Tibold | Senior Radiological Health Specialist | G-18 | 0 | |
| New Rochelle Office | | | | |
| .hor Czerwinskyj | Senior Sanitary Engineer | G-24 | 40 | Compliance |
| Rita Aldrich | Associate Radiological Health Specialist | G-23 | 40 | Compliance |
| Rochester Office | | | | |
| Elaine S. Carter | Associate Radiological Health Specialist | G-23 | 35 | Compliance |
| Lary Rawa | Senior Radiological | G-18 | 0 | |
| Syracuse Office | | | | |
| Gary Baker | Associate Radiological Health Specialist | G-23 | 50 | Compliance |
| Vidya Goyal | Senior Radiological | G-18 | 0 | |
| | | | | |

BERP STAFF TRAINING - 1985

03-11-1985 AT 15:30

Page 1

APPENDIX E

1

| LNAME | COURSE | SPONSOR |
|-------------|-------------------------|----------|
| ALDRICH | APPLIED HEALTH PHYSICS | DR / |
| BAKER | GENERAL HEALTH PHYSICS | LOWELL U |
| BOCHNIEWICZ | INTRO TO IBM PC | DOH |
| BRANCH | SUPERVISION | DOH |
| CONDON | DATA BASE III | DOH |
| DREIKORN | APPLIED HEALTH PHYSICS | DR |
| HART | INTRO TO IBM PC | DOH |
| HOURIGAN | SUPERVISION | DOH |
| HOURIGAN | WANG | DOH |
| HUANG | DATA BASE III | DOH |
| KEITH | DATA BASE III | DOH |
| KEITH | INTRO TO IBM PC | DOH |
| MILLER | CPR | ARC |
| RIMAWI | GENERAL HEP' TH PHYSICS | LOWELL U |
| WALSH | DATA BASE 1 I | DOH |
| WIGLEY | DATA BASE III | DOH |
| WIGLEY | INTRO TO IBM PC | DOH |

TOTAL

Printed 17 of the 160 records.

BERP STAFF TRAINING - 1984

03-11-1985 AT 15:32

Page 1

| LNAME | COURSE | SPONSOR |
|-----------|--------------------------------|---------|
| ALDRICH | NUCLEAR MEDICINE - Q. A. | FDA |
| ALDRICH | TELETHERAPY | NRC - |
| BAKER | TELETHERAPY | NRC - |
| BAKER | TRANSPORTATION COURSE | NRC - |
| BRANCH | WANG | LEAP |
| DREIKORN | BIOLOGICAL EFFECTS | HARV - |
| DREIKORN | ENGINEERING COURSE | NRC - |
| DREIKORN | NUCLEAR MEDICINE - Q.A. | FDA |
| DREIKORN | TELETHERAPY | NRC |
| GOYAL | HEALTH PHYSICS | ORNL - |
| GDYAL | MEDICAL ISOTOPES | NRC - |
| IGNATZ | HEALTH PHYSICS | ORNL - |
| MIDDLETON | HEALTH PHYSICS | ORNL - |
| MILLER | EMPLOYEE COUNSEL. & COR. DISC. | DOH |
| MILLER | NEXT | |
| NICHOLAS | WANG | FDA |
| RIMAWI | RISK ASSESSMENT | LEAP |
| ZOBEL | HEALTH PHYSICS | HARV |
| ZOBEL | | NRC - |
| ZOBEL | LICENSING | NRC - |
| ZOBEL | MEDICAL ISOTOPES | NRC - |
| ZOBEL | RADIOCHEMISTRY | NRC - |
| L UDEL | RADIOLOGICAL EMERGENCY RESP | FEMA |

TOTAL

Printed 22 of the 160 records.

BERP STAFF TRAINING - 1983

03-11-1985 AT 15:33

Page 1

1

| ALDRICHDOSE ASSESSMENTFEMAALDRICHENVIRONMENTAL MONITORINGBNLALDRICHINSPECTIONNRCALDRICHQUALITY ASSURANCE STEPSKODALIBOZEKFDA COMPLIANCEFDAALIBOZEKQUALITY ASSURANCE STEPSKODBAKERBENTFDABAKERQUALITY ASSURANCE STEPSKODCARTERQUALITY ASSURANCE STEPSKODCARTERQUALITY ASSURANCE STEPSKODHARVEYBENTFDAHARVEYQUALITY ASSURANCE STEPSKODHUANGDOSE ASSESSMENTFEMAHUANGENVIRONMENTAL MONITORINGBNLIGNATIBENTFDAKERRQUALITY ASSURANCE STEPSKODMIDDLETONDOSE ASSESSMENTFDAMIDDLETONDOSE ASSESSMENTFEMAMIDDLETONQUALITY ASSURANCE STEPSKODMILLERENVIRONMENTAL MONITORINGBNLMILLERENVIRONMENTAL MONITORINGBNLMILLERRADIOCHEMISRYNRCMILLERRADIOCHEMISRYNRCMILLERQUALITY ASSURANCE STEPSKODMILLERRADIOCHEMISRYNRCMIBOLDDOSE ASSESSMENTFEMATIBOLDQUALITY ASSURANCE STEPSKODMILLERRADIOCHEMISRYNRCIBOLDDOSE ASSESSMENTFEMATIBOLDQUALITY ASSURANCE STEPSKOD | | COURSE | SPONSOR |
|--|--|---|---|
| TIBOLD DOSE ASSESSMENT FEMA | ALDRICH ALDRICH ALDRICH ALDRICH ALDRICH ALIBOZEK BAKER BAKER BAKER BAKER CARTER CARTER HARVEY HUANG HUANG IGNATZ KEITH KERR MIDDLETON MIDDLETON MIDDLETON MILLER O'BRIEN | DOSE ASSESSMENT ENVIRONMENTAL MONITORING INSPECTION QUALITY ASSURANCE STEPS FDA COMPLIANCE QUALITY ASSURANCE STEPS BENT LICENSING QUALITY ASSURANCE STEPS BENT QUALITY ASSURANCE STEPS BENT QUALITY ASSURANCE STEPS DOSE ASSESSMENT ENVIRONMENTAL MONITORING BENT QUALITY ASSURANCE STEPS DOSE ASSESSMENT INSPECTION QUALITY ASSURANCE STEPS ENVIRONMENTAL MONITORING RADIOCHEMISRY QUALITY ASSURANCE STEPS | FEMA BNL NRC KOD FDA KOD FDA KOD FDA KOD FDA KOD FDA KOD FEMA BNL FDA KOD FEMA NRC KOD FEMA NRC KOD FEMA NRC |
| | RIMAWI TIBOLD | DOSE ASSESSMENT | HARV - |

TOTAL

Printed 27 of the 160 records.

BERP STAFF TRAINING - 1982 03-11-1985 AT 15:34

Page 1

1

| LNAME | COURSE | SPONSOR |
|-------------|--|---------|
| ALDRICH | LICENSING LINEAR ACCELERATORS MEDICAL ISOTOPES RADIOLOGICAL EMERGENCY RESP LINEAR ACCELERATORS | NRC / |
| ALDRICH | LINEAR ACCELERATORS | FDA |
| ALDRICH | MEDICAL ISOTOPES | NRC - |
| ALIBOZEK | RADIOLOGICAL EMERGENCY RESP | NRC - |
| BAKER | LINEAR ACCELERATORS | FDA |
| BRANCH | EMPLOYEE COUNSEL. & COR. DISC. | DOH |
| CARTER | LICENSING | NRC - |
| CARTER | LINEAR ACCELERATORS | FDA |
| CONDON | LINEAR ACCELERATORS | FDA |
| CZERWINSKYJ | EMPLOYEE COUNSEL. & COR. DISC. LICENSING LINEAR ACCELERATORS LINEAR ACCELERATORS LINEAR ACCELERATORS | FDA |
| DREIKORN | LINEAR ACCELERATORS | FDA |
| GDYAL | LINEAR ACCELERATORS LINEAR ACCELERATORS QUALITY ASSURANCE STEPS LINEAR ACCELERATORS LINEAR ACCELERATORS QUALITY ASSURANCE STEPS | FDA |
| GDYAL | QUALITY ASSURANCE STEPS | KOD |
| HARVEY | LINEAR ACCELERATORS | FDA |
| IGNATZ | LINEAR ACCELERATORS | FDA |
| IGNATZ | QUALITY ASSURANCE STEPS | KOD |
| KEITH | DOSE ASSESSMENT | FEMA |
| KEITH | LINEAR ACCELERATORS | FDA |
| KERR | DOSE ASSESSMENT | FEMA |
| KERR | LINEAR ACCELERATORS | FDA |
| MIDDLETON | LINEAR ACCELERATORS | FDA |
| MIDDLETON | MEDICAL ISOTOPES | NRC |
| MIDDLETON | OCCUP. & ENV. RADIATION PROT. | |
| D'BRIEN | LINEAR ACCELERATORS | FDA |
| RIMAWI | LINEAR ACCELERATORS | FDA |
| TIBOLD | LINEAR ACCELERATORS | |

TOTAL

Printed 26 of the 160 records.

APPENDIX F REVIEW OF SELECTED LICENSE FILES

 Our Lady of Lourdes Memorial Hospital Binghamton, New York License Number: 25-2 Effective Date: February 9, 1983 Expiration Date: January 31, 1986

> This license authorizes a cobalt teletherapy unit. Condition 19 of amendment 15 states that "means shall be provided for verbal communication with the patient at all times." No reference is made to visual contact. Amendment 18 issued September 20, 1984 corrects this deficiency by requiring that the facility "be provided with a system permitting continuous observation of the patient from outside the treatment room." No deficiencies were noted.

 Elmira Cardiology, P.C. Elmira, New York License Number: 2807 Effective Date: June 28, 1983 Expiration Date: June 30, 1988

> This license authorize technetium and thallium for cardiac imaging studies, including a generator. Condition 12 states that "radioactive material shall only be used for the specific uses as stated under Condition 9 of this license; no other uses are authorized." There was no specific reason for using this condition other than the fact that the user is a cardiologist and wanted to emphasize that only cardiac studies were authorized. The applicant did not submit information concerning authorization from a hospital that has agreed to admit patients containing radioactive material. On August 28, 1984 the licensee requested authorization to received material off-hours. Such deliveries would be placed in a locked drop box located outside the facility. The State asked a number of questions concerning the proposal, but eventually denied the request because of concerns about the security of the box.

3. Nyack Hospital

Nyack, New York License Number: 509 Effective Date: April 76, 1983 Expiration Date: January 31, 1988

This licenses authorizes medical Groups I-V and xenon. The license does not contain the standard condition concerning the hospitalization of Group V patients. In addition, the radiation safety committee did not have a representative of administration. The applicant's did not submit procedures regarding dose calibrator calibration. The applicant's therapy procedures included radium brachytherapy. Since radium was not requested specifically, the State should have asked the applicant to confirm that radium would not be used.

 Walter B. Schulman, M.D. Glen Cove, New York License Number: 2819 Effective Date: August 27, 1984 Expiration Date: August 31, 1989

> This license authorizes 1-125 in a Norland bone densitometer and Gadolinium-153 in a spine scanner. Condition 12 which reads "The use of radioactive materials in or on human being shall be by a physician" does not appear necessary. Condition 10 states that material shall be used by or under the supervision of and in the physical presence of the licensee. It appears that a trained technician shall actually be doing the studies.

5. Syosset Community Hospital Syosset, New York License Number: 2824 Effective Date: February 1, 1985 Expiration Date: February 28, 1990

This license authorizes medical Groups I-III. Although the applicant did not request a generator, Group III was authorized. No other deficiency was noted.

 Jaekyeong Heo, M.D. Massena, New York License Number: 2804 Effective Date: May 25, 1983 Expiration Date: June 30, 1986

This license authorizes medical Groups I-IV and xenon. A recent amendment changed the address of the license, however, a description of the facility was not submitted. No other deficiencies were noted.

 Mohamed Isam Abdelazim, M.D. Johnson City, New York License Number: 2803 Effective Date: November 5, 1982 Expiration Date: February 28, 1987

This license authorizes Groups I-III and xenon. A recent amendment added the xenon. No deficiencies were noted.

 Crouse-Irving Memorial Hospital Syracuse, New York License Number: 1710-2 Effective Date: February 21, 1984 Expiration Date: March 31, 1986

> This license authorizes Group VI only. The drawing showing the source storage area is not adequate. It does not show where in the facility the room is located, not even a room number. The only information provided is that it is on the third floor. There were no procedures regarding source accountability , periodic inventory, source transport or patient room survey procedures.

 Johnstown Hospital Johnstown, New York License Number: 2814 Effective Date: March 29, 1984 Expiration Date: April 30, 1989

This license authorizes medical Groups I-III. No significant deficiencies were noted.

 Anthony A. Maglione, M.D. Yonkers, New York License Number: 1007 Effective Date: May 12, 1980 Expiration Date: May 31, 1985

This license authorizes medical Groups I-IV. The license is issued in one physicians name although two other physicians are authorized users. License should be reissued with "Radiological Group" as licensee.

11. Nassau Hospital Mineola, New York License Number: 22-2 Effective Date: January 10, 1985 Expiration Date: January 31, 1989

This license authorizes medical Groups I-V, in vitro studies, non-human research, and other diagnostic procedures. The license authorizes 100 mCi quantities of I-125 and I-131 in any form for research and was selected to review bioassay procedures. Bioassay procedures were submitted by the licensee on September 24, 1984. Additional information was also provided on November 1, 1984.

12. Jeffery Adler, D.P.M. New Rochelle, New York License Number: 2813 Effective Date: February 21, 1984 Expiration Date: May 31, 1989 This licenses authorizes a Lixiscope for diagnostic imaging of the human foot. No deficiencies were noted.

13. The Child's Hospital Albany, New York License No.: 2821 Effective Date: October 3, 1984 Expiration Date: October 31, 1989

This license authorizes medical Groups I-IV. The applicant indicated that generators would not be used, however, Group III was still authorized. No other deficiencies were noted.

APPENDIX G INSPECTION CONDUCTED SINCE PREVIOUS REVIEW

| License Category | Scheduled Frequency | Inspection Priority | Number of Inspections |
|--|---|--|---|
| Type A Broad Type B Broad Type C Broad Academic A Academic B Research A Research B Medical A Medical B Brachytherapy Pacemaker Civil Defense Irradiator Laboratory Teletherapy Lock Test Chromatography Gauge Veterinarian Other State Lab | 1 3 3 3 4 3 4 3 4 3 4 3 4 3 4 4 4 4 4 6 6 6 6 | I II II II II II II II II II II II II I | 15 6 3 4 13 1 3 75 21 35 6 30 4 11 14 1 14 1 14 1 8 1 5 7 3 |
| | | | |

| Categories | License Log Key | Inspection & Fee Designation | Inspection Frequency | Renewal Frequency-yr | Inspection Priority | Fre |
|--|--------------------|---------------------------------|-------------------------|-------------------------|------------------------|-----|
| Broad A - > 500 mCi total 'th Committee | ΒA | 1 | 1 | 1 | 1 | |
| broad B -< 500 mCi total with Committee | BB | Ш | 3 | 5 | II | |
| Broad C - < 500 mCi total without Committee | BC | Ш | 3 | 5 | 11 | 3 |
| Academic A > 500 mCi | AA | VI | 3 | 5 | II | 3 |
| Academic B 500 mCi | AB | VII | 4 | 5 | III | 4 |
| Research A > 500 mCi | RA | VI | 3 | 5 | II | |
| Research B ≤500 mCi | RB | VII | 4 × | 5 | III | |
| Specific Medical A Groups I, II, III, IV, V with generator | SMA | IV | 3 | 5 | 11 | |
| ecific Medical B oups I, II | SMB | v | 4 | 5 | III | 3 |
| Brachytherapy | В | VIII | 3 | 5 | 11 | |
| Pacemaker | Р | VIII | 3 | 5 | 11 | |
| Civil Defense | CD | ×III | 4 | 5 | Li) | |
| Irradiator - Open Source | 1 | IX | 4 | 5 | 111 | 1 |
| rradiator - Self Shielded | 1 | X | 4 | 5 | III | |
| Laboratory | L | VI/VII | 4 | 5 | 111 | |
| Teletherapy | т | IX . | 4 | 5 | 111 | |
| Leak Test | LT | XI . | 6 | 5 | IV | |
| Chromatography | GC | XI | 6 | 5 | IV | |
| Gauges | Ga | XI | 6 | 5 | IV | |
| Radium | Ra | VIII | 3 | 5 | II | |
| erinarian | v | VIII | 3 | 5 | II | |
| er | 0 | XIV | 4 | 5 | 111 | |
| GLM & GLL | GLM/GLL | XII | | 1 | V | |

APPENDIX H

,

incidents during 1984. Of these reports, 41% required follow-up by Bureau and/or Regional staff members. The most noteworthy incidents reported during the year are as follows:

- 1. It was discovered in January, that steel reinforcing rods contaminated with radioactive cobalt-60 were sent to the United States in shipments from a Mexican foundry. The U.S. NRC requested assistance from the Health Department in locating and evaluating contaminated table legs in the State. The Bureau staff surveyed about 800 items that were suspected to have been contaminated with the cobalt-60. Less than 50 of the items surveyed were actually contaminated and they were found in Buffalo. They were returned to the manufacturer for proper disposal.
- 2. The New York State Police notified the Bureau that seven packages containing radiopharmaceuticals fell from a pick-up truck near Port Chester. Six packages were retrieved, one was missing; it contained lodine 123 capsules inside a lead container. A Radiological Health Specialist, from the New Rochelle Regional Office, assisted Westchester County staff in the search for the missing package. The package was found later that day; the containers were damaged as well as four of the six sodium iodide capsules. The package and its contents were returned to the company, from which it originated.
- 3. The Bureau was advised that the Department of Environmental Conservation staff found contamination by Americium-241 in the sanitary sewer line from the EAD Metallurgical, Inc. site in Tonawanda, New York, to the town sewage treatment plant. Follow-up surveys of the ashes in the town sewage treatment plant and the town landfill also showed contamination. The Bureau participates in a Task Force involved in seeing that this problem is resolved. A similar problem was later found in Grand Island sewage treatment plant which resulted from discharges by another company manufacturing smoke detector foils.
- 4. BERP was notified that the Chappagua Police found a container, apparently dropped from a delivery vehicle, that contained radioactive materials. A New Rochelle, gional Office Radiological Health Specialist assisted Westchester County staff in investigating the incident. The package was a Class B container with 8,CDO curies of Hydrogen 3 adsorbed onto uranium powder. Air samples performed at the scene by licensee staff revealed no detectable airborne concentration of Hydrogen 3. The container, which was not damaged, was picked up by the licensee to which it was destined.
- 5. The Bureau was advised that an American Red Cross employee's film badge had a reading in excess of 500 Rem. A Radiological Health Specialist, from the Albany Regional Office, investigated. The part-time employee to whom the badge was assigned, only operated the Gammacell 1,000 blood irradiator occasionally and admitted to not routinely wearing his film badge. The Red Cross has performed a complete blood count on the employee. The results did not indicate radiation exposure to the badge itself, and does not represent an exposure to the employee.

APPENDIK I

HCCickant 2>

STATE OF NEW YORK-DEPARTMENT OF HEALTH

INTEROFFICE MEMORANDUM

To: K. Rimawi

From: D. Dreikorn

Date: March 22, 1985

Subject:

Misplaced Cesium-137 Source at Roswell Park Memorial Hospital

Bill O'Brien, of the Buffalo Regional Office, notified me this morning of a temporarily misplaced cesium-137 brachytherapy source (15 milligrams radium equivalent - approximately 37.5 millicuries - 124 R/hr at 1 cm) at Roswell Park Memorial Hospital.

On March 19, 1985, the radium technician inserted Fletcher delcos applicators containing cesium-137 sources into a patient for treatment. At treatment termination on March 20, 1985, it was discovered that one applicator was absent a source. The Health Physics staff conducted a thorough GM survey of the patient's room and did not locate the source. However, the source was located in the hospital garbage disposal area.

. The Health Physics staff concluded the source was misplaced during insertion.

Estimated is set to the housekeeping staff are being calculated by John ... Pierce, Health Physicist. A complete incident report with corrective actions to avoid recurrence will be forthcoming from the facility.

cc: Dr. Stasiuk

Mr. Slocum Dr. Hetling

Dr. Smith-Blackwell

| In the Matter of the Finding of Violation against | BUREAU OF ENVIRONMENTAL |
|--|--|
| | RADIATION PROTECTION |
| ESPONDENT Joel M. Gross, M.D. | DECENTRE |
| /B/A Rockville Nuclear Laboratory | RECEIVEN |
| DDRESS 30 Hempstead Avenue | JUL 1 7 1984 |
| Rockville, Centre, New York 11570 | DIVISION OF ENVIRONMENTAL |
| OCKET NO. SR 405 | PROTECTION |
| FINDING OF VIOLATION AND NOTICE OF HEARING having been person and the matter having been set for a hearing | no on 6/13/84 |
| n | Default, 🔯 following a Stipulation |
| l upon the record, make the Findings and Conclusions as indicated on the assessing of penalties as required by Section 206 of the Public Health L | ottached page(s) to this form, and Order |
| the proceedings: | |
| | |
| Cose Dismissed. | and the second |
| Case Dismissed. ORDERED that a fine of \$ be assessed. The fi, or in equal monthly installments of \$ | |

Failure to remedy the said violations within the specified time will subject you to further action and may result in closing without further notice to you. Willful violation of this order is a misdemeanar, subjecting you to further action by the Attorney General. Færry action of the Administrative Tribunal is subject to public release.

int I be The im map 1/84

Received by

Administrative Tribunal Representative Da

Owner/Operator

Date

AT 30 (4/79)

ADDITIONAL INFORMATION ON REVERSE SIDE

APPENDIX

PI Ven pII

ADMINISTRATIVE TRIBUNAL

DETAILS OF ADMINISTRATIVE TRIBUNAL REPRESENTATIVE DECISION

| RESPONDENT | Joel | Gross, | M.D. | |
|------------|------|--------|------|--|
|------------|------|--------|------|--|

Page 1 of 2

/B/A _____ Rockville Nuclear Laboratory

DOCKET NO. SR 405 DATE OF DECISION

(Attach to Form AT 30)

| No. | Code, Rule or Regulation | Findings | Conclusion | <u>Penal</u> Assessed | |
|-----|---|------------------------------------|------------|--------------------------|------|
| 1 | 10 NYCCR 6 | 10 NYCRR 16.100 and License | Sisteria | 81000 | 2 |
| | 16.100 | Condition 11 require that a Dose | | | |
| | | Calibrator be provided and used as | | | |
| | | stated in the Application for NYS | | | |
| | | Radioactive Materials License | | | |
| | | dated February 15, 1982. Contrary | | | |
| | | to this requirement a Dose | | | |
| | | Calibrator has not been provided. | | | |
| 2 | 10 NYCRR | 10 NYCRR 16.100 and License | Sostan | 7000 | Ya |
| | 16.100 | Condition 11 require that | | | 1/00 |
| | | personnel monitoring badges be | | | |
| | | worn by personnel who handle | | | |
| | | radioactive materials as stated | | | 1 |
| | | in the Application for NYS | | | / |
| | | Radioactive Materials License | | | 1 |
| | | dated Feb. 15, 1982. | | | |
| | - | Contrary to this requirement | | | |
| | a and a state of the | personnel monitoring badges are no | t | | |
| | | worn by personnel who handle | | | |

radioactive materials.

Administrative Tribunal Representative

second of a design of the contraction in the

AT 30.1 (4/79)

DEPARIMENT OF BEALLIN ADMINISTRATIVE TRIBUNAL

DETAILS OF ADMINISTRATIVE TRIBUNAL REPRESENTATIVE DECISION

RESPONDENT Joel Gross, M.D.

Page 2 of 2

D/B/A Rockville Nuclear Laboratory

DOCKET NO. SR 405 DATE OF DECISION

(Attach to Form AT 30)

| No. | Code, Rule or Regulation | Findings | Conclusion | <u>Penal</u> Assessed | <u>ties</u> Modifie |
|-----|-----------------------------|-----------------------------------|------------|--------------------------|------------------------|
| 3 | 10 NYCRR | 10 NYCRR 16.100 and License | Safteren | 1000 | 1 |
| | 16.100 | Condition 11 require that syringe | | | 1 |
| | | shields be provided for use at | | | |
| | | this facility as stated in the | | | |
| | | Application for NYS Radioactive | | | + |
| | | Materials license dated Feb. 15, | | | |
| | | 1982. Contrary to this require- | | | |
| | | ment syringe shields have not | | | |
| | | been provided. | | 404 | + |
| 4 | 10 NY CRR | 10 NYCRR 16.10 (a)(3) requires | Fistation | 1200 | 1 |
| | 16.10 (a) (3) | that radiation installations | | | |
| | | where radioactive material not | | | |
| | | contained in a sealed source is | | 1 | |
| | | handled, shall be surveyed at | | | |
| | | least once a month for radio- | | | |
| | | active contamination. Records | | | |
| | | of such surveys must be maintain | 69 | | |
| | | in accordance with 10 NYCRR 16. | 14. | | - |
| | 이 같은 것이 많을 것 | Contrary to this requirement the | re | - TUAVU | |

Dop. Aprsentative Administrative

0:

(4/79) 30

Respondent: Joel M. Bross, M.D. DBA: Rockville Nuclear Laboratory Docket No.: SR-405

the following requirements are to be met by the respondent:

 A request for a variance on the requirement for a dose calibrator shall be submitted to: N.Y. State Department of Health Bureau of Environmental Radiation Pro ection Empire State Plaza, Tower Bldg.

Albany, New York 12237

Attn: Diane Dreikorn

The decision of the Bureau will be binding.

- 2. Personnel monitoring badges shall be obtained for personnel who handle radioactive materials and a copy of the order shall be sent to this office.
- 3. A syringe shield shall be provided. We are in receipt of a copy of your order for such a shield.
- 4. Surveys for radioactive contamination shall be made at least once a month and the results recorded. This represents a minimum requirement.

: maximum assessable fine of $\underline{$4000}$ will be modified to $\underline{$100}$ on the basis that the above requirements are met by July 30, 1984.

The modified fine of <u>\$100</u> shall be paid in total by <u>July 2, 1984</u>. The remaining amount of <u>\$3900</u> will be forgiven provided all stated requirements are fulfilled and provisions of the State Sanitary Code complied with as determined by a follow-up inspection on or after July 30, 1984 by the Southern Regional Office.

Failure to comply with the provision of this agreement may result in the full assessed fine of \$4000 being imposed and due.

June 13, 1984

DATE

albert L. De Tranking m.D.

Albert De Martino, M.D. Administrative Tribunal Representative

函

ADMINISTRATIVE TRIBUNAL REPRESENTATIVE DECISION

| In the Matter of the Finding of Violation against |
|---|
| Rodolfo Byrne MD |
| Rodolfo Byrne M.D. |
| 945 5th Avenue |
| New York, New York 10021 |
| SR 406 |
| |

RECEIVED

Byin

ADMINISTRATIVE TRIBU

AUG 1 0 1984

BUREAU OF ENVIRONMENTAL RADIATION PROTECTION

| I, on <u>Au</u> | 15 . 8, 1984, Difollowing a Hearing, Difo | or a hearing on <u>August 8, 1984</u> allowing a Default, <u>101</u> atlowing a Stipu | lotion, |
|-----------------|--|--|---------|
| r ' upon the | e record, make the Findings and Conclusions as indicat | ted on the ottoched page(s) to this form, and | Order |
| isessi | ng of panalties as required by Section 206 of the Public | c Health Low of the State of New York or dis | mis- |
| sing the pro | ceedings: | | |
| 1 | Cose Dismissed. | | |
| 1 | ORDERED that a fine of \$ be assess | | |
| | , or in ryual monthly installments a | | months. |
| | Payments are due on the first of each month beginn | ing with | |
| 1 | X) ORDERED that a fine of \$ 1000. be assess | sed which will be madified to Sheld in ab | eyançe |
| | violations = 1 are correct | ted by Feb. 1, 1985 or in occordance | ce with |
| | the ottached schedule of abotements. Failure to cor | | in the |
| | full assessed fine being due. the modeled fina mus | | i |
| | -or in equal monthly installments of S | | Lasthe |
| r | - first of each month beginning with | | |
| Ļ | ORDERED, that the permit be suspended from | | |
| | ORDERED, that the permit be revoked effective on | | |
| | ORDERED, that closure be effective on | ond continue until | |
| | DRDERED, that obstement of violations be comple | ted in accordance with attached schedule. | |
| | \underline{X} ORDERED, that reinspection be made on or after \underline{F} | eb. 1, 1985 | |
| [| X ORDERED, | | |
| | | | |

closing without further notice to you. Willful violation of this order is a misdemeanar, subjecting you to further action by the Attorney General. Every action of the Administrative Tribunal is subject to public release.

August 8,1985 Dote Administrative Tribuppt Representative

| Received by A | Bun | (M) |
|----------------|-----|-------|
| | | -/ -: |
| Owner/Operator | 1 | Dote |

1

ADDITIONAL INFORMATION ON REVERSE SIDE

Respondent: Rodolfo Byrne, M.D.

DBA: Rodolph Byrne, M.D.

Docket No: SR-406

The following requirements must be met by the respondent:

An application must be submitted to the Bureau of Enviromental Radiation Protection to renew license #1819 for a period of six (6) months.

During this time period the respondent will arrange for the proper disposal of the licensed unit, and keep this office informed of the progress made in this direction.

The maximum assessable fine of $\frac{$1,000}{abeyance}$ will be held in abeyance on the basis that the above requirements are met by February 1, 1985.

Failure to comply with this agreement will result in the full assessed fine of \$1,000 being imposed and due.

-

Mugint & 1954 Date 36

Frank R. Hopf D.D.S. Administrative Tribunal Representative

PAGE UF 3 STATE OF NEW YORK COCKET NUMBER 门门 5R 406 DEPARTMENT OF HEALTH ADMI RATIVE TRIBUNAL 014:00 Southern Regional OPERATOR MUST New Rochelle, StR. 145 Huguenot ANSWER HERE WITH 10801 04 IN 7 DAYS (INSTRUC. NOTICE TO APPE TRIBUNAL HEARING TIONS ON THE BACK FOR FINDING OF VIOLATION(5) YOU ARE HEREBY SUMMONED TO APPEAR FOR A HEARING AT THE LAW PLEASE CHECK CHE DATE ADMINISTRATIVE TRIBUNAL OFFICE AT THE ABOVE ADDRESS ON THE DAY CODE BOX FOR EACHITEM 19 84 AT 10 : A.M. P.M. CONCERNING THE FOL-VIOL OF. August OF RULE NO. MAXIMUM ADMIT LOWING VIOLATION(S), INQUIRIES ABOUT THE HEARING OR THE FINDING(S) REGULATION VIOLATION ADMIT WITH ASSESSIBLE DENY SHOULD BE DIRECTED TO THE ABOVE OFFICE. FINE EXPL IONYCRR Jul 10,84 Section IONYCRR 16.100 of the New York State \$ 1,000 16,100 Samilary Code states that no person shall moderial except possess any Radioadive license issued Specific nursuant -12: Part 16 Sunitaly under State 10 Code -Pho Contrary abore you 10 POSSESS ColelI-60 -Velot (A) SOMER Such licens in Bout 19.83

APPENDIX K REVIEW OF SELECTED COMPLIANCE FILES

 Albany Medical Center Albany, New York License Number: 590 Type: Broad Medical Inspection Dates: 12/12-14/83 Inspector: R. Middleton Type of Inspection: Routine Complete Report Reviewed By: S. Zobel 1/10/85 Enforcement Letter: 12/20/83 Licensee Response: 1/19/84 Acknowledgement: 1/26/84

No deficiencies were noted. The report was reviewed more than one year after the inspection.

2. The Child's Hospital Albany, New York License Number: 2821 Type: Medical Groups I-IV Inspection Date: 3/7/85 Inspector: R. Middleton Type of Inspection: Initial Complete Report Reviewed by: D. Dreikorn, 3/25/85 Enforcement Letter: 3/15/85 Licensee Response: None (not due yet) Acknowledgement: None

No deficiencies were noted.

3. Johnstown Hospital Johnstown, New York License Number: 2814 Type: Medical Groups I-III Inspection Date: 12/13/84 Inspector: R. Middleton Type of Inspection: Initial Complete Report Reviewed by: D. Dreikorn 12/24/84 Enforcement Letter: 12/19/84 Licensee Response: 1/15/85 Acknowledgement: 1/23/85

> Failure to do dose calibrator checks should have been cited as an item of noncompliance rather than a recommendation. Licensee committed to quarterly linearity checks and initial geometry check in application. The hospital administrator was not available for an exit meeting. The inspector should followup with a telephone call. No other deficiencies were noted.

4. Our Lady of Lourdes Memorial Hospital Binghamton, New York License Number: 25-2 Type: Teletherapy Inspection Date: 8/15/84 Inspector: Baker Type of Inspection: Routine Complete Report Reviewed by: D. Dreikorn 3/15/85 Enforcement Letter: 9/4/84 Licensee Response: None Required Acknowledgement: N/A

No deficiencies were noted. The report was reviewed seven months after the inspection.

5. Erie County Medical Center Buffalo, New York License Number: 491-3 Type: Brachytheraphy Inspection Date: 12/12/84 Inspection: W. O'Brien Type of Inspection: Routine Complete Report Reviewed by: D. Dreikorn 3/15/85 Enforcement Letter: 1/8/85 Licensee Response: 1/28/85 Acknowledgement: 2/5/85

> With regard to inspection surveys, there was a note in the inspection report to the effect that the patient chart information was incomplete. It was not clear, however, what was missing or if this was discussed with the licensee. One item of noncompliance concerned the licensee failure to fully implement NCRP 37 regarding order forms, inventory, and use records. The inspector stated, however, that the sources were handled carefully and the licensee demonstrated good accountability. The item of noncompliance could have been a bit more specific. No other deficiencies were noted.

6. State University College of Buffalo Buffalo, New York License Number: 1052 Type: Academic Inspection Date: 3/21/85 Inspector: W. O'Brien Type of Inspection: Routine Complete Report Reviewed by: D. Dreikorn 3/85 Enforcement Letter: 4/1/85 License Response: Not due yet Acknowledgement: N/A Although the scope of the licensee's program is small, significant programmatic difficulties were noted. The inspector recommended a followup inspection with three months. Apparently, the licensee's problems go back for almost 10 years. It was suggested that this might be an opportune time to hold an enforcement conference with the licensee to discuss the problems since they have just hired a new RSO and are rewriting their manual including revising their procedures to enhance the role of the RSO. The deficiencies include lack of surveys, leak tests, inventories, lab procedures not being followed and others.

7.

Nassau County Medical Center East Meadow, New York License Number: 10 Type: Medical Groups I~V and Research Inspection Date: 5/17/84 Inspector: R. Aldrich Type of Inspection: Routine Complete Report Reviewed by: K. Rimawi and D. Dreikorn 9/84 Enforcement Letter: 5/31/84 Licensee Response: 7/4/84 Acknowledgement: 9/28/84

This was apparently a difficult inspection. Although the program was found to be generally well run, some problems were noted which the RSO took exception to. The licensee is authorized to store waste for decay provided (a) half-life is less than 65 days, (b) must be held for 10 half-lives, and (c) monitored prior to disposal as normal trash. The RSO vehemently objected to holding for 10 half-lives, believing that a radiation reading of less than 0.03 mR/hr indicates the material is not radioactive and can be disposed of as normal trash. Also, the inspector recommended additional surveys and the RSO flatly refused to consider performing additional surveys. The licensee currently performs monthly wipes and relies on an area monitor in the hot lab in between the monthly wipes. The inspectors recommendation to perform daily area surveys seems reasonable. Unfortunately, the license does not tie the licensee to a more reasonable survey program. In the enforcement letter, a citation was made regarding the waste procedures. A number of recommendations were also made which could have been items of noncompliance if the license had been as tight as it should. The licensee's response to the enforcement letter denied the violation and proposed no corrective action. The State's acknowledgement letter reiterated the items of noncompliance and provided further clarification of the State's requirements. Unfortunately, the State did not request a response to the letter and had to write again on December 27, 1984 requesting a response. The licensee responded on January 15, 1985, but did not fully address the issues. Further action on the part of the State is required.

8. Nassau County Medical Center East Meadow, New York License Number: 10-4 Type: Brachytherapy Inspection Date: 5/17/84 Inspector: R. Aldrich Type of Inspection: Routine Complete Report Reviewed by: K. Rimawi and D. Dreikorn 9/84 Enforcement Letter: 5/31/84 Licensee Response: 7/5/84 Acknowledgement: 9/25/84

This inspection was done in connection with the nuclear medicine license. (No. 7 discussed above.) Three items of noncompliance were noted with regard to this license. (1) Personnel monitoring records for nurses were not being maintained, (2) nurses were sharing dosimeters, and (3) radiation levels in unrestricted area exceeded 100 millirem in seven consecutive days. As with the violations on the Number 10 license, the licensee contested these violations. With the third violation, the State could have presented a stronger case if they had indicated that the licensee would have to meet both 2 mrem in any one hour and the 100 mrem in seven consecutive days requirements.

9. St. Elizabeth Hospital Utica, New York License Number: 457-1 Type: Medical Groups I-III Inspection Date: 8/1/84 Inspector: G. Baker Type of Inspector: Followup partial Report Reviewed by: D. Dreikorn 3/15/85 Enforcement Letter: 2nd followup inspection 1/31/85, followed by letter dated 2/8/85 Licensee Response: None yet Acknowledgement: N/A

The initial inspection was conducted on 6/12/84 which was a complete routine inspection. The hospital had recently hired a new tech and because of her lack of understanding, numerous items of noncompliance were noted. It would appear that an appropriate citation would have concerned instruction of workers. At the first followup inspection, four of the five original items had not been corrected. At second followup two items remained uncorrected. Inspector still states that "lack of understanding has prevented total corrections." It would appear that the State, by not emphasizing instructions to workers, has taken the wrong approach. The report was reviewed seven months after the inspection.

NUMBER OF X-RAY INSPECTIONS

DURING 1984

| | Facilities | Tubes |
|-----------------------|------------|-------|
| | | |
| Hospitals | 116 | 862 |
| Clinics | 48 | 103 |
| Radiologists | 118 | 368 |
| Physicians | | |
| (Except Radiologists) | 378 | 428 |
| Chiropractors | 275 | 275 |
| Osteopaths | . 4 | 4 |
| Educational | | |
| Institutions | 25 | 135 |
| Others | 71 | 122 |
| Dentists | 1367 | 2722 |
| Veterinarians | 122 | 135 |
| Podiatrísts | 150 | 168 |
| | | |
| | | |
| | | |

2674 5322

APPENDIX L

TOTAL REGISTRANTS

ある

Se 1 Ser and

N'A

43.4 V

and the second MARK DA

t a vise

| | Facilities | Tubes |
|-------------------------------------|------------|--------|
| Hospitals | 223 | 2092 |
| Clinics | 75 | 169 |
| Radiologists | 194 | 595 |
| Physicians (Except Radiologists) | 1206 | 1394 |
| Chiropractors | 652 | 659 |
| Osteopaths | 13 | 13 |
| Educational Institutions | 88 | 571 |
| Others | 182 | 372 |
| Dentists | 6158 | 12,314 |
| Veterinarians | 522 | 578 |
| Podiatrists | 553 | 630 |
| | | |
| | 9,866 | 19,387 |

STATEWIDE SAMPLING SCHEDULE

. .

| location | Weekly | Sampling Point | Sample Collector |
|------------------------|-----------|--|---|
| | | (AIR) | |
| ny 0101-001 | Weekly | Roof - Albany Co. Health Dept. | Barry Peck Albany Co. Health Dept. So. Ferry & Green Sts. Albany, NY 12201 518-445-7848 |
| Brookhaven 5151–003 | Weekly | RNL Perimeter Station "P-7" | Gary Tarulli/Eleanor Levine/ Gloria Klein Suffolk Co. Health Dept. Radiation Control Unit 496 Smithtown Bypass Smithtown, NY 11787 516-360-3000 - Ext. 58 |
| Colonie 0153-001 | Weekly | NL Industries at West Side Boundry | William Wigley BERP 518-473-3621 |
| Cortlandt 5951-002 | Weekly | NYU Meteorological Tower, near Indian Point | Richard Lidsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Road White Plains, NY 10601 914-285-5031 |
| senburgh . 5953-018 | Bi-weekly | Roof of Martin Bldg. Westchester Industrial Park | Richard Lidsky/Vicki C landro Westchester Co. Health Dept. 112 E. Post Road White Plains, NY 10601 914-285-5031 |
| Ontario 5857-002 | Weekly | Ginna Sta. on Site Station #7, 1000' ± West of Reactor | Don Fillion/John Catlin RG&E, Ginna Sta. 1503 Lake Road Ontario, NY 14519 315-524-4446 |
| Scriba 3767-003 | Weekly | Lake Rd., Niagara Mohawk Sta. "E" | Bruce Holliday Oswego Co. Health Dept. 70 Bunner Street Oswego, NY 13126 315-349-3254 |
| Shoreham 5128-001 | Weekly | End of Sound Rd. 1000 ft. ± NNE of Reactor | Gary Tarulli/Eleanor Levine/ Gloria Klein Suffolk Co. Health Dept. 496 Smithtown Bypass Smithtown, NY 11757 516-360-3000 - Ext. 58 |

| <u> </u> | Frequency | Sampling Point | Sample Collector |
|-----------------------|-------------|--|---|
| hold 159-001 | Weekly | Fishers Island Water Treatment Plant | Clarence Dixon Fishers Island Water Treatment Plant Box 535 Fishers Island, NY 06390 516-788-7422 |
| <u> </u> | Weekly | Union Carbide Long Meadow Road | Jim Ditton Union Carbide Corporation P.O. Box 324 Tuxedo, NY 10987 914-351-2131 |
| Milton 361-001 | Weekly | Kesselring site, Atomic Rd. & East Boundary | William Wigley BERP 518-473-3621 |
| | | (MILK) | |
| 01-001 | Weekly | Cafeteria at Empire State Plaza | Radiological Science Lab 518-474-7501 |
| Morich 51-001 | nes Monthly | Thee's Dairy | Eleanor Levine/Gloria Klein/ Gary Tarulli Suffolk Co. Health Dept. Radiation Control Unit 496 Smithtown Bypass Smithtown, NY 11787 516-360-3000 - Ext. 58 |
| <u>ster</u> 21-001 | Monthly | Myruski Farm Greycourt Rd. | Bill Warren NYS Ag. & Market P.O. Box 387 Wallkill, NY 12589 914-895-2495 |
| | Monthly | Harold Hurlbut Farm RD 2 Oswego, NY | Bruce Holliday Oswego Co. Health Dept. 70 Bunner St. Oswego, NY 13126 315-349-3254 |
| Haven 58-001 | Monthly . | Sherry France Farm RD 1 Oswego, NY | Bruce Holliday Oswego Oo. Health Dept. 70 Bunner St. Oswego, NY 13126 315-349-3254 |
| = 57-002 | Monthly | Marian Molino Farm 179 Knickerbocker Rd. Ontario, NY 14519 | Elaine Carter/Larry Rawa NYS Dept. of Health Rochester Area Office 42 S. Washington St. Rochester, NY 14608 716-423-8068 |

-2-

| | | -3- | |
|--------------------------|-------------|---|---|
| Location | Frequency | Sampling Point | Sample Collector |
| Ontario ~857-003 | Monthly | NYS/RG&E Split | Don Fillion/John Catlin RG&E, Ginna Sta. 1503 Lake Rd. Ontario, NY 14519 315-524-4446 |
| Scriba 3767-004 | Monthly | NYS/Niagara Mohawk Split | Hugh J. Flanagan Nine Mile Pt. Nuclear Sta. P.O. Box 32 Lycoming, NY 10393 315-343-2110 |
| Shoreham 5128-001 | Monthly | NYS/LILCO Split | Kenneth C. Sullivan Long Island Lighting Co. 175 E. Old Country Rd. Hicksville, NY 11801 516-420-6145 |
| Yorktown 5968-001 | Monthly | Hanover Farm Yorktown Heights | Richard Lidsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 914-285-5031 |
| Yorktown 5968-002 | Monthly | NYS/ConEd Split | Vincent Lander ConEd Indian Point Station Buchanan, NY 10511 914-526-5348 |
| | | (WAIER) | |
| Albany 0101-001 | Weekly | Division of Lab & Research, ESP, Albany, NY | Radiological Science lab 518-474-7501 |
| Brookhaven 5151-001 | Monthly | Peconic River at Brookhaven Site Border | Eleanor Levine/Gloria Klein/ Gary Tarulli Suffolk Co. Health Dept. 496 Smithtown Bypass Smithtown, NY 11787 516-360-3000 - Ext. 58 |
| Buchanan 5941-003 | Monthly | Hudson River in immediate area of plant discharge NYS/ConEd Split | Vincent Lander ConEd Indian Point Sta. Buchanan, NY 10511 914-526-5348 |
| Buchanan 5941-004 | Monthly | Hudson River in immediate area of plant intake NYS/ConBd Split | Vincent Lander ConEd Indian Point Sta. Buchanan, NY 10511 914-526-5348 |
| cape Vincent 2226-001 | Semi-annual | St. Lawrence River at Cape Vincent | Stephen Powers Watertown District State Office Building 317 Washington St. Watertown, NY 13601 315-782-0100 |

-3-

| Location | Frequency | Sampling Point | Sample Collector |
|-------------------------|-------------|--|---|
| Chemung 754-001 | Semi-annual | Chemung River near Chemung | Elaine Carter/Larry Rawa NYS Dept. of Health Rochester Area Office 42 S. Washington St. Rochester, NY 14608 716-423-8068 |
| ©lanie 0153-001 | Semi-annual | Patroon Creek below NL Industries lagoon dis- charge & Colonie STP | Barry Peck Albany Co. Health Dept. S. Ferry & Green Sts. Albany, NY 12201 518-445-7848 |
| Colonie 0153-002 | Weekly | Colonie Water Treatment Plant - Mohawk River | Jack Halstuch Mohawk View Treatment Plant Latham Water District 312 Wolf Road Latham, NY 12110 518-783-2705 |
| Cortlandt 5951-002 | Weekly | Hudson River at Verplank | Richard Litsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 914-285-5031 |
| .eva 3402-001 | Quarterly | Seneca Lake - raw water intake | David R. Weller Geneva Water Treatment Plant Geneva, NY 14456 315-789-5755 |
| Greenburgh 5953–009 | Weekly | Tributary to Saw Mill River at Self-Powered Lighting | Richard Litsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 914-285-5031 |
| Greenburgh 5953-021 | Monthly | Pond at Westchester Community College | Same as above |
| Ithaca 5401-001 | Semi-annual | Southern Tip of Cayuga Lake | John Anderson Tompkins Co. Health Dept. Biggs Building 1287 Trumansburg Rd. Ithaca, NY 14850 607-273-7272 |
| Lake George 5651-001 | Semi-annual | Lake George | William Wigley BERP |

518-473-3621

-4-

Loomis - drill well

Stream W. of Cornell Burial Site

Lake Ontario immediate

NYS/RG&E Split

area of Ginna Discharge

Bloam - dug well

LaBarr - dug well

Kahr's Well

Sample Collector

John Anderson Tompkins Co. Health Dept. Biggs Bldg. M. Nasarallah - drill well 1287 Trumansburg Rd. Ithaca, NY 14850 607-273-7272

> Bruce Stone NYS Dept. of Health Massena District Office 10 Water St. Massena, NY 13362 315-769-2870

William Wigley BERP . 518-473-3621

> Richard Lidsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 914-285-5031

Same as above

Bruce Holliday Oswego Co. Health Dept. 70 Bunner St. Oswego, NY 13126 315-349-3254

Jim DeVald Niagara Co. Health Dept. P.O. Box 428 Niagara Falls, NY 14302 716-284-3129

Mike Malcolm Ontario Water Filtration Dept. 1961 Lake Rd. Ontario, NY 14519 315-524-8520

1

Don Fillion/John Catlin RG&E, Ginna Station 1503 Lake Road Ontario, NY 14519 315-524-4446

Stream E. of Cornell Burial Site Massena Semi-annual St. Lawrence River at 4469-001 Massena Milton Monthly Glowegee Creek at US 65 4561-001 gaging station off W. Milton Rd. Mt. Pleasant Quarterly Kensico Reservoir 5957-005 Mt. Pleasant Monthly Pocantico Reservoir 5957-019 New Haven Monthly Lake Ontario at Mexico 3758-002 Bay (Dempster Beach) Niagara Falls Monthly West Branch of Niagara 3102-001 River Ontario Waekly Lake Ontario, Ontario 5857-001 Water Dist. Filtration Plant

Frequency

Armal

utario Monthly 5857-002

Location

Lansing

101-004

\$401-005

5456-002

5456-006

5456-007

5456-013

5456-016

5456-017

-5-

| Location | Frequency | Sampling Point | Sample Collector |
|------------------------|-----------|--|--|
| Ontario 5857-003 | Monthly | Lake Ontario immediate area of Ginna Intake NYS/RG&E Split | Don Fillion/John Catlin RG&E, Ginna Station 1503 Lake Road Ontario, NY 14519 315-524-4446 |
| Orangeburg 4352-001 | Monthly | Pond 400' ESE of Becton- Dickinson Plant | Alain Grosjean Rockland Co. Health Dept. Sanatorium Rd., Bldg. D Pomona, NY 10970 914-354-0200 - Ext. 2526 |
| Orangeburg 4352-002 | Monthly | Sparkill Creek at Rt. 303 and Mt. View Rd. | Same as above |
| Orangeburg 4352-003 | Monthly | Tappen Lake Reservoir | Same as above |
| Oswego 3702-001 | Weekly | Public Water Supply at City Hall - Lake Ontario Water | Earl Wilkinson Superintendent of Water City Hall Oswego, NY 13126 315-343-0111 |
| Scriba 3767-003 | Monthly | Lake Ontario immediate area of plant discharge Nine Mile Point NYS/9-Mile Point Split | Hugh Flanagan/Edward Leach Nine Mile Point Reactor P.O. Box 32 Lycoming, NY 13093 315-343-2110 - Ext. 1395 |
| Scriba 3767-004 | Monthly | Lake Ontario immediate area of plant intake NYS/9-Mile Point Split | Same as above |
| Shoreham 5128-001 | Monthly | Shoreham Site near Stone Jettys discharge NYS/LILCO Split | Kenneth Sullivan Shoreham Plant LILCO 175 E. Old Country Rd. Hicksville, NY 11801 516-420-6145 |
| Shoreham 5128-002 | Monthly | Shoreham Site near plant intake - NYS/LILCO Split | Same as above |
| Southold 5159-001 | Monthly | Fishers Island | Clarence Dixon Plant Manager Box 535 Fishers Island, NY 06390 516-788-7422 |
| Tuxedo `565-002 | Monthly | Indian Kill - Union Carbide | Jim Ditton Union Carbide Corp. P.O. Box 324 Tuxedo, NY 10987 914-351-2131 |

-6-

| Location | Meekly | Sampling Point | Sample Collector |
|-----------------------|-------------|---|---|
| Watertown 2269-001 | Semi-annual | Black River at Watertown | Steven Powers NYS Dept. of Health Watertown District State Office Building 317 Washington Street Watertown, NY 13601 315-782-0100 |
| Yonkers 5907-007 | Weekly | Water Treatment Plant Saw Mill River Intake (raw water) | Richard Lidsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 914-285-5031 |
| | | (FALLOUT) | |
| Albany 0101-001 | Weekly | Roof - Albany Co. Health Dept., Albany | Barry Peck Albany Co. Health Dept. So. Ferry & Green Sts. Albany, NY 12201 518-445-7848 |
| Greenburg 5953-018 | Weekly | Roof - Martin Blåg. Westchester Ind. Park | Richard/Lidsky/Vicki Calandro Westchester Co. Health Dept. 112 E. Post Rd. White Plains, NY 10601 |

-7-

All WVNS (West Valley Nuclear Service) samples will be collected by:

William O'Brien/Barbara Ignatz/ Ferenc Tibold NYS Dept. of Health Buffalo Regional Office 584 Delaware Ave. Buffalo, NY 14202 716-847-4500

914-285-5031