



UNITED STATES  
NUCLEAR REGULATORY COMMISSION

REGION IV

511 RYAN PLAZA DRIVE SUITE 400  
ARLINGTON, TEXAS 76011 8064

September 10, 1996

Stephen M. Quennoz, Acting Vice  
President and Chief Nuclear Officer  
Portland General Electric Company  
Trojan Nuclear Plant  
71760 Columbia River Highway  
Rainier, Oregon 97048

SUBJECT: NRC INSPECTION REPORT 50-344/96-07;72-17/96-01 AND NOTICE OF  
VIOLATION

Dear Mr. Quennoz:

An NRC inspection was conducted August 19-22, 1996, at your Trojan Nuclear Plant. The enclosed report presents the scope and results of that inspection.

The inspection covered the work in progress at Trojan related to the decommissioning and dismantlement of the facility. Specific areas reviewed during this inspection included the efforts to release a portion of the industrial area for use in the dry cask storage program for Trojan's spent fuel, review of the fire protection program as it related to work activities in potentially contaminated areas, and a review of the circumstances around the recent entry of an individual into a locked and posted high radiation area without radiation protection technician coverage.

Based on the results of this inspection, the NRC has determined that one violation of NRC requirements occurred. The violation is cited in the enclosed Notice of Violation (Notice) and the circumstances surrounding this violation are described in detail in the enclosed report. Your efforts to identify this violation, to immediately report it to the NRC inspector onsite at the time, and to implement corrective actions were prompt and effective. We are citing the violation however, because of the potential significance involved, and the fact that the individual who committed the violation had been involved in a similar incident in August 1995 which involved a preventable exposure following the failure to follow proper radiation safety procedures (Inspection Report 50-344/95-07). Please note that you are required to respond to this letter and should follow the instructions specified in the enclosed Notice when preparing your response. The NRC will use your response, in part, to determine whether further enforcement action is necessary to ensure compliance with regulatory requirements.

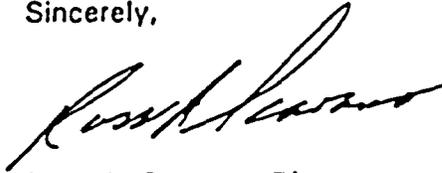
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Portland General Electric Company

-2-

In accordance with 10 CFR 2.790 of the NRC's "Rules of Practice," a copy of this letter, its enclosure(s), and your response will be placed in the NRC Public Document Room (PDR).

Sincerely,

A handwritten signature in black ink, appearing to read "Ross A. Scarano". The signature is written in a cursive style with a large, looping initial "R".

Ross A. Scarano, Director  
Division of Nuclear Material Safety

Portland General Electric Company

-3-

Dockets No.: 50-344, 72-17

License No.: NPF-1

Enclosures:

1. Notice of Violation
2. NRC Inspection Report  
50-344/96-07; 72-17/96-01

cc w/enclosures:

Harold K. Chernoff, Manager  
Licensing Compliance and  
Commitment Management  
Portland General Electric Company  
Trojan Nuclear Plant  
71760 Columbia River Highway  
Rainier, Oregon 97048

Mr. Michael J. Sykes  
Board of County Commissioners  
Columbia County  
St. Helens, Oregon 97501

Mr. David Stewart-Smith  
Oregon Department of Energy  
625 Marion Street NE  
Salem, Oregon 97310

Mr. Lloyd K. Marbet  
19142 S.E. Bakers Ferry Road  
Boring, Oregon 97009

Mr. Jerry Wilson  
Do It Yourself Committee  
570 N.E. 53rd  
Hillsboro, Oregon 97124

Mr. Eugene Roselie  
Northwest Environment Advocates  
133 S.W. 2nd Avenue  
Portland, Oregon 97204

Mr. Tim Vitkus  
ORISE  
P. O. Box 117  
Oak Ridge, Tenn 37831-0117

bcc to DMB (IE01)

bcc distrib. by RIV:

- LJCallan, RA
- MTMasnik, NRR/PDND (11B20)
- LHThonus, NRR/PDND (11B20)
- SSBajwa, NRR/PDND (11B20)
- CLPittiglio, NMSS/DWM/LLDP (7F27)
- SHWeiss, NRR/PDND (11B20)
- DWeiss, OC/LFDCB (4503)
- LEKokajko, NMSS/SFPO (06G22)
- DMoser, NMSS/DWM/LLDP (8F37)
- \*CLCain, DNMS/TA
- \*DBSpitzberg, DNMS/NMLB
- \*JVEverett, DNMS/NMLB
- FAWenslawski, WCFO
- VLTharpe, NMSS/SFPO (06G22)
- \*NMLB-5th floor (Hodges)
- \*MIS System
- \*RIV Files (2)- 4th floor file room (Part 50 Docket)
- \*RIV Files - 5th floor file room (Part 72 Docket)
  
- \*W/IFS Form

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09/1/96	09/9/96	09/ /96	09/10/96

OFFICIAL RECORD COPY

ENCLOSURE 1

NOTICE OF VIOLATION

Portland General Electric Company  
Trojan Nuclear Plant

Docket No.: 50-344  
License No.: NPF-1

During an NRC inspection conducted on August 19-22, 1996, one violation of NRC requirements was identified. In accordance with the "General Statement of Policy and Procedure for NRC Enforcement Actions," NUREG-1600, the violation is listed below:

Facility Operating License NPF-1, Paragraph 2.C(2), states, in part, that the Technical Specifications contained in Appendix A to the license are incorporated into the license. Section 5.10.2 of the Technical Specifications states, in part, that doors into locked high radiation areas shall remain locked except during periods of access by personnel under an approved radiation work permit (RWP) that shall specify the dose rate levels in the immediate work areas and the maximum allowable stay times for the individuals in those areas. In lieu of the stay time specification of the RWP, direct or remote continuous surveillance may be made by personnel qualified in radiation protection procedures to provide positive control over the activities being performed within the area.

RWP 960016, "Large Bore Pipe Cutting," required continuous radiation protection coverage during entry into high radiation areas.

Contrary to the above, on July 25, 1996, a contract employee working under the provisions of RWP 960016 entered a locked and posted high radiation area without continuous radiation protection coverage or assigned stay times.

This is a Severity Level IV violation (Supplement IV).

Pursuant to the provisions of 10 CFR 2.201, Portland General Electric Company is hereby required to submit a written statement or explanation to the U.S. Nuclear Regulatory Commission, ATTN: Document Control Desk, Washington, D.C. 20555 with a copy to the Regional Administrator, Region IV, 611 Ryan Plaza Drive, Suite 400, Arlington, Texas 76011, and a copy to the NRC Resident Inspector at the facility that is the subject of this Notice, within 30 days of the date of the letter transmitting this Notice of Violation (Notice). This reply should be clearly marked as a "Reply to a Notice of Violation" and should include for each violation: (1) the reason for the violation, or, if contested, the basis for disputing the violation, (2) the corrective steps that have been taken and the results achieved, (3) the corrective steps that will be taken to avoid further violations, and (4) the date when full compliance will be achieved. Your response may reference or include previous docketed correspondence, if the correspondence adequately addresses the required response. If an adequate reply is not received within the time specified in this Notice, an order or a Demand for Information may be issued as to why the license should not be modified, suspended, or revoked, or why such other action as may be proper should not be taken. Where good cause is shown, consideration will be given to extending the response time.

Because your response will be placed in the NRC Public Document Room (PDR), to the extent possible, it should not include any personal privacy, proprietary, or safeguards information so that it can be placed in the PDR without redaction. However, if you find it necessary to include such information, you should clearly indicate the specific information that you desire not to be placed in the PDR, and provide the legal basis to support your request for withholding the information from the public.

Dated at Arlington, Texas  
this 10th day of September 1996

bcc to DMB (IE01)

bcc distrib. by RIV:

- LJCallan, RA
- MTMasnik, NRR/PDND (11B20)
- LHThonus, NRR/PDND (11B20)
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- \*JVEverett, DNMS/NMLB
- FAWenslawski, WCFO
- VLTharpe, NMSS/SFPO (06G22)
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- \*W/IFS Form

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09/1/96	09/9/96	09/1/96	09/10/96

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ENCLOSURE 2

U.S. NUCLEAR REGULATORY COMMISSION  
REGION IV

Docket No.: 50-344  
License No.: NPF-1  
Report No.: 50-344/96-07  
Licensee: Portland General Electric Company  
Facility: Trojan Nuclear Plant  
Location: 121 S. W. Salmon Street, TB-17  
Portland, Oregon  
Dates: August 19-22, 1996  
Inspector: J. V. Everett, Health Physicist  
Accompanied By: T. J. Vitkus, Consultant, ORISE  
Approved By: D. Blair Spitzberg, Ph.D, Chief  
Nuclear Materials Licensing Branch

Attachment: Partial List of Persons Contacted  
List of Inspection Procedures Used  
List of Items Opened, Closed, and Discussed  
List of Acronyms

## EXECUTIVE SUMMARY

### Trojan Nuclear Plant NRC Inspection Report 50-344/96-07

This inspection included aspects of the licensee's decommissioning activities, a fire protection program review, an evaluation of the final survey activities for the portion of the industrial area that will be licensed as the Part 72 dry cask storage area, and a review of the circumstances surrounding the recent entry of an individual into a locked and posted high radiation area.

- Trojan is currently performing a final survey of a portion of their industrial area. The final survey program was reviewed as part of this inspection. The activities underway and those planned by the licensee should provide for an adequate basis to release the surveyed area for inclusion into Trojan's Independent Spent Fuel Storage Installation program (ISFSI) (Section 1).
- The fire protection program at Trojan was reviewed and found to be effective in maintaining a low likelihood of a fire in an area which could involve radioactive material or contamination (Section 2).
- A small fire outside the facility involving a transformer being dismantled for salvage was effectively handled by site personnel (Section 2).
- On August 25, 1996, a contract employee entered a posted and locked high radiation area without continuous coverage by a qualified radiation protection technician. This was a violation of 10 CFR 20.1601, the Trojan Technical Specification, procedures, and radiation worker permit requirements. This is identified as a Severity Level IV violation (Section 3).

## Report Details

### Summary of Plant Status

The Trojan Nuclear facility is currently undergoing decommissioning. Decontamination and removal activities have recently been completed for the safety injection pump rooms, containment spray pump rooms, centrifugal charging pump rooms, and the reactor coolant pump motors.

In addition to the decommissioning activities underway, Trojan has applied for a Part 72 license for an ISFSI. An area of the northeast corner of the industrial area (old protected area) had been selected as the location for the ISFSI. The low-level radwaste building and a portion of the warehouse located in the area planned for the ISFSI were dismantled and removed. An active final survey effort was underway for the designated area to verify that contamination levels in the area where the ISFSI pad will be placed are below unrestricted release limits.

#### 1 Survey of the ISFSI Area (83890)

##### 1.1 Inspection Scope

The northeast corner of the industrial area (old protected area) is planned as the storage location for the Trojan spent fuel. The spent fuel will be placed in dry cask storage using the Sierra Nuclear TranStor cask design. The storage casks will be placed on a concrete pad in an area fenced and designated as the ISFSI, licensed under Part 72. Prior to pouring the concrete for the storage pad, the planned pad location and adjacent ground areas are being surveyed for contamination. This inspection reviewed the activities in progress and planned to verify that the licensee was performing an adequate final survey of the area to allow for the release of the area from the Part 50 license and transfer to the Part 72 license. The survey plan, procedures, training records of the assigned survey personnel, instrumentation, and the counting laboratory program were reviewed as part of this inspection.

##### 1.2 Observations and Findings

The Trojan Final Survey Plan dated August 13, 1996, was reviewed by the inspectors and the NRC consultant, Oak Ridge Institute of Science and Education (ORISE). The grid overlay described in the final survey plan was compared to the actual grid established in the area being surveyed. The determination of where to take soil samples and gamma exposure levels was reviewed and found to be acceptable. Samples taken were labeled with location, identification, person taking the sample, and date. A chain-of-custody was used to transfer the samples to the counting laboratory. Trojan planned to take samples from 66 sampling locations within the area. This was determined to be a reasonable number of samples for the area being evaluated.

Survey documentation was reviewed for areas completed. There appeared to be adequate documentation for instrument daily check-out, daily records of areas surveyed, records of exposure rate measurements, and chain-of-custody.

The inspectors observed the licensee's personnel performing environmental gamma background measurements, soil sampling, and soil contamination surveys. The areas being surveyed had been correctly designated as either affected or unaffected, based on activities that had been conducted historically in the areas. The area under the radwaste building was designated as affected and required 100 percent survey. The area west of the radwaste building was designated as unaffected. A fence had been erected in an area larger than where the survey was being conducted to prevent possible re-entry of contaminated material into the areas that had been surveyed.

Soil area surveys were conducted by the licensee using a CM-11 gas flow proportional beta detector. The CM-11 detectors were moved at a rate of five cm/sec over the soil. As of this inspection, Trojan had completed approximately 10 percent of the planned surveys. To conduct a side-by-side verification of the efforts by the licensee, the ORISE consultant initiated a survey of the areas using a sodium iodide (NaI) gamma detector. The NaI detector is a highly sensitive detector capable of measuring small increases in radiation levels above background. The ORISE consultant completed a survey of 100 percent of the area where the low level radwaste building had been located and approximately 20 percent of the unaffected area. The survey found no elevated levels of contamination.

The soil area being surveyed had been conditioned to facilitate the survey. This process resulted in a mixing of the soil such that any contamination on the top of the soil could have been mixed into the soil. This would result in attenuation of the beta radiation resulting in a lower beta detection efficiency, making the contamination harder to detect using beta survey techniques. Though the use of beta scans is the proper technique for surveying surfaces such as concrete slabs, the use of a sodium iodide (NaI) detector is a preferred method for surveying soil areas. Based on comments received from the NRC and ORISE, the licensee is reviewing and revising the survey procedures to incorporate the use of NaI scans. The licensee will repeat the survey using a NaI detector for the soil areas previously surveyed using the CM-11 detector.

Instrument calibration and operational checkouts were reviewed. The instruments selected for the survey activities were acceptable for the type of contamination that could be present. Appropriate calibration sources were being used which included Tc-99 for beta and Pu-239 for alpha. The sources were National Institute of Standards and Technology (NIST) traceable with calibration referenced to 4 $\pi$  geometry. The operational checkout procedures were reviewed and found acceptable. Minimum detectable activities were determined to be appropriate.

The quality assurance (QA) oversight activities were reviewed to determine if adequate QA oversight was being incorporated into the survey program. The QA oversight appeared to be at an appropriate level. Observation of survey activities had been conducted on several occasions. An issue of nonconformances was identified relating to the speed the detector was being moved over the ground for an area being surveyed. The involved area was resurveyed at the required 5 cm/sec.

The program to evaluate soil samples was reviewed. An intrinsic germanium detector was used for soil sample counting. Two liter samples were counted. Calibration was based on NIST traceable mixed gamma standard. Daily energy calibrations were performed. If the daily energy calibration results varied from the standard by more than three sigma, recalibration or servicing was performed. Two hour background counts were performed and operability parameters were verified, based on energy resolution, peak width, and activity of Co-57, Co-60, and Cs-137 in a mixed gamma standard. The soil samples to be counted were prepared by transferring the sample to a numbered pan, dried for 2 hours, weighed, and placed in a 2-liter marinelli container. Samples were counted for 2 hours. Raw data sheets were generated with identification number of sample, peak search, and identified radionuclides in  $\mu\text{Ci/g}$  from the software peak ID library. The chemist then reviewed the spectrum for good peak resolution.

The soil sampling program appeared to be adequate; however, there was no repeat analysis requirement for any of the samples (i.e., every 20th sample) in order to confirm the repeatability of the analysis nor was there a program to validate the analysis results through an independent outside quality control check. The inspector discussed with licensee representatives the inclusion of these program elements as an area of potential improvement to further validate the accuracy of the soil analysis program.

Portions of five soil samples collected by the licensee were provided to the NRC for analysis by ORISE. The ORISE results of the sample analysis will be compared to the Trojan analysis results to verify the accuracy and sensitivity of the Trojan analytical equipment. This will be tracked as Open Item 50-344/9607-02.

Procedures were reviewed for guidance concerning when reinvestigation of an area was required based on surveys, exposure rate measurements, or sample analysis results. The approach used for soil data interpretation, based on determination of compliance with the 100 m<sup>2</sup> average activity level, and hot spot guidelines were found to be acceptable. Action levels and investigative actions were also found to be acceptable.

Three areas outside the fenceline had been selected to conduct background sampling and external exposure rates. These areas included the switchyard, meteorological tower area, and acid receiving area. Thirty samples were planned. These areas were selected because the soil type was similar to the soil in the area

being surveyed for the ISFSI pad. The background sampling program was found to be acceptable.

Upon completion of the survey effort by Trojan, a final survey report will be generated and submitted to the NRC for review. This report will include the data necessary to support the eventual release of the planned ISFSI area from the Part 50 license.

### 1.3 Conclusion

Trojan is currently performing a final survey of a portion of their industrial area. The final survey program was reviewed as part of this inspection. The activities underway and those planned by the licensee should provide for an adequate basis to release the surveyed area for inclusion into Trojan's ISFSI program.

## 2 Fire Protection Program (64704)

### 2.1 Scope

The Trojan fire protection program provides controls to ensure that appropriate measures are maintained to protect the facility from fires that could impact the safe storage of irradiated fuel or result in the release of radioactive material. This inspection focused on the fire protection program controls that are applied to the work activities being conducted in potentially contaminated areas.

### 2.2 Observation and Findings

PGE-1012, "Fire Protection Program," and TPP 13-7, "Fire Protection Procedure," established the fire protection program for the Trojan facility. The fire loading within the facility was typically controlled to prevent a sufficient amount of material in any one location to support a fire for more than 15 minutes. Specific guidelines were specified in TPP 13-7 which established the combustionable loading limits for the plant areas. Exceptions could be obtained from the fire protection engineer by completing a form and obtaining approval.

The most significant fire potential within the plant was the protective clothing inventory, the dirty laundry, and transient combustionables brought to work area such as herculite, anti-Cs, and cleaning fluids. The use of separation of combustionables, safety watches during jobs involving sparks or flames, control of combustionable materials and liquids, and the procedural controls in place had resulted in minimal fire problems at the plant. The fire protection engineer conducted weekly walkthroughs of the facility to verify adherence to fire loading limits. This had added to the success of the fire prevention effort at Trojan.

Since plant shutdown and during decommissioning, the emphasis had been on removal of combustionable materials. All lube oil from deactivated pumps, the

charcoal filters, and the diesel fuel oil, except for the diesel fire pump, had been removed from the site. Most scaffolding was metal and wood that was used was fire treated.

Most fire detection systems in the plant were operational. As areas were dismantled, the fire detection system and the fire sprinkler system for those areas were evaluated for deactivation and removal, if no combustibles or fire hazards remain. Prior to deactivating a system, a safety screening review was completed. This usually included a 50.59 review.

A two man fire brigade was established, consisting of a security officer and an operator. The fire brigade was not qualified for self-contained breathing apparatus (SCBA). For fires requiring entry with SCBA, the licensee planned to rely on the Rainer Fire Department. All North American contract personnel who may be performing dismantling activities were trained as safety watch personnel. This included training on the fire protection requirements in the plant.

The licensee had a written mutual aid agreement with the Rainer Fire Department. Annual meetings were typically conducted and access badges were established for most of the fire department personnel. The annual meetings typically included tours of plant areas, review of access provisions, and discussions of the changes that had occurred at the site since the last visit by the fire department.

A chemical work permit program was used by the licensee to control the chemicals on site. Procedure PS 3-28, "Use and Handling of Flammable Liquids" established storage requirements, labeling, and use requirements for flammable liquids. Exceptions were allowed with the approval of the fire protection engineer.

During this inspection, tours of the auxiliary building, reactor building, and fuel building were conducted. Fire loading and availability of fire extinguishers were found to be adequate. Housekeeping had improved since the last inspection.

On Monday, August 12, 1996, a small fire occurred in a main transformer, located outside the building, which was being dismantled for salvage. The transformer had been drained of oil; however, wood and fiber insulating material in the transformer was combustible. Small fires of this type were anticipated during the cutting effort, and a nitrogen purge was in place for use during the cutting operation. Two dry chemical extinguishers were prestaged at the work location. The fire created smoke, little heat, and no visible flame and was eventually extinguished. Controls were established to prevent spread of any oil that may remain in the transformer. To prevent repeat of the incident, the nitrogen purge was increased, and the sequence of cutting was changed. No incidents occurred during the cutting of the second transformer. No contamination or radioactive material was involved with the incident.

### 2.3 Conclusion

The fire protection program of the licensee was reviewed and found to be effective in maintaining a low likelihood of a fire in an area which could involve radioactive material or contamination.

A small fire outside the facility involving a transformer being dismantled for salvage was effectively handled by site personnel.

## 3 Followup on the Unauthorized Entry into the Locked High Radiation Area (92701)

### 3.1 Scope

During NRC Inspection 50-344/96-05 conducted on July 22-25, 1996, the licensee informed the NRC inspector on site that an individual had entered a locked and posted high radiation area without continuous radiation protection coverage. This was in violation of the radiation work permit requirement for the area. The circumstances related to this event were further evaluated during this inspection.

### 3.2 Observations and Findings

A North American contractor performing safety watch duty in containment on July 25, 1996, was sent to the lower elevation levels by his supervisor to verify that no fires had been started due to the cutting operations underway. Grating on the floor of the upper elevations allowed the hot slag to fall to the lower elevations. While conducting the inspection of areas on the lower level, the contractor scaled a locked fence and entered an area that was posted as a high radiation area to verify that the slag that had fallen in the area had not created a fire hazard. A radiation protection technician on the upper level noticed the contractor in the area posted as a high radiation area and proceeded to investigate whether the radiation work permit (RWP) requirements were being met for that area. The radiation protection technician found that the individual had not notified the radiation protection department prior to entry and had climbed the fence to gain entry without obtaining continuous radiation protection coverage as required by the RWP. The radiation protection technician directed the contractor to leave the high radiation area and reported the incident to his supervisor. All work in the area was stopped and a Corrective Action Request was generated to investigate the cause of the incident. The contract worker was subsequently laid off, and all workers were provided with additional training concerning the RWP restrictions in containment. The licensee determined that all other contract workers were aware of the requirements for high radiation area entry and that the incident appeared to be an isolated case of poor judgement by the worker.

The requirements for controlling high radiation area access are specified in 10 CFR 20.1601. The licensee is required to ensure that each entrance or access point to a high radiation area has a method of controlling entry. The Trojan

Defueled Technical Specifications, Section 5.10.2 establishes the controls for locked high radiation areas. Locked high radiation areas are to be conspicuously posted and entrance shall be controlled by requiring issuance of a RWP. Access by personnel under an approved RWP shall specify the dose rate levels in the immediate work areas and the maximum allowable stay times for individuals in those areas. In lieu of the stay times specification in the RWP, direct or remote continuous surveillance may be made by personnel qualified in radiation protection procedures to provide positive exposure control over the activities being performed within the area.

Several RWPs had been established for work in containment. The worker involved with this incident was logged on RWP 960016, "Large Bore Pipe Cutting." This RWP, as well as all RWPs for work in containment, required continuous radiation protection coverage during entry into a high radiation area.

In addition to the requirements of the RWPs, licensee's Procedure TPP 20-1, "Rules for Working in Radiologically Controlled Areas," Revision 4, Section 4.4.6, stated that entry into posted high radiation areas requires compliance with Procedure TPP 20-12, even if you believe you can complete the task for minimal exposure. Licensee's Procedure TPP 20-12, "Access Control for High and Very High Radiation Areas," Revision 2, stated in Section 4.2 that access to high radiation areas require arrangement for a radiation protection technician to accompany the entry.

Maximum dose rates in the area entered by the individual were approximately 100 mR/hr. The maximum contact dose rate was 800 mR/hr. A review of the exposure records for the day of the entry indicated the individual received an exposure of 17.4 mrem. This exposure represents all work performed during the day, including any exposure received while in the high radiation area.

This incident is a violation of 10 CFR20.1601, Trojan Technical Specifications, Trojan site procedures, and Trojan's radiation work permit program and will be tracked as 50-344/9607-01. Unresolved Item 50-344/9605-01, opened during the initial evaluation of this incident, will be closed.

### 3.3 Conclusion

On August 25, 1996, a contract employee entered a posted high radiation area without continuous coverage by a qualified radiation protection technician. This was in violation of 10 CFR 20.1601, the Trojan technical specification, procedures, and radiation worker permit requirements. This was identified as a Severity Level IV violation.

ATTACHMENT

PARTIAL LIST OF PERSONS CONTACTED

Licensee

A. Bowman, Radiation Protection Supervisor  
H. Chernoff, Licensing Manager  
G. Huey, Radiation Protection Supervisor  
T. Meek, Radiation Protection Manager  
S. Quennoz, Site Executive  
L. Rocha, Radiological Engineer  
S. Schneider, Operations Manager  
B. Shoemaker, Security Supervisor  
T. Terrell, North American Site Manager  
J. Vessick, fire Protection Engineer

State of Oregon

A. Bless, Oregon Department of Energy Resident Inspector

NRC Consultant

T. Vitkus, Oak Ridge Institute for Science and Education

INSPECTION PROCEDURES USED

64704	Fire Protection Program
83890	Closeout Inspection and Survey
92701	Followup

ITEMS OPENED, CLOSED, AND DISCUSSED

Opened

50-344/9607-01	VIO	Unauthorized entry into a Locked High Radiation Area
50-344/9607-02	IFI	Comparison of PGE and ORISE Soil Sample Analysis

Closed

50-344/9605-01	URI	Unauthorized entry into a Locked High Radiation Area
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**LIST OF ACRONYMS USED**

ALARA	As Low As is Reasonably Achievable
IFI	Inspection Followup Item
ISFSI	Independent Spent Fuel Storage Installation
NaI	Sodium Iodide
NIST	National Institute of Standards and Technology
NOV	Notice of Violation
NRC	Nuclear Regulatory Commission
ODOE	Oregon Department of Energy
ORISE	Oak Ridge Institute of Science and Education
PGE	Portland General Electric
QA	Quality Assurance
RWP	Radiation Work Permit
SCBA	Self-Contained Breathing Apparatus
SNM	Special Nuclear Material
URI	Unresolved Item