UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D.C. 20555-0001

November 4, 1999

Ms. Lexsea Linardakis
Ms. Michele Riddell
Co-Presidents
Safe Legacy
173 Huguenot Street
New Paltz, NY 12561

Dear Ms. Linardakis and Ms. Riddell:

I am responding to your letter dated September 3, 1999, to John Minns and myself requesting additional information on the leakage of water from the spent fuel pools (SFPs) at Indian Point, Unit 1 (IP1). The responses to your questions below supplement the information provided to you in our letters of June 25, 1999, and June 29, 1999.

Question 1

Why is the spent fuel pool of IP1 still leaking?

NRC's Response

At the time that Consolidated Edison Company of New York, Inc. (Con Edison) discovered the increased loss of water inventory from the Fuel Handling Building (FHB) pools, all of the pools were interconnected. The exact locations of any leaks that could be responsible for the loss of inventory were not known. However, the licensee reduced the water levels within the SFP and installed isolation gates between the pools. These actions significantly reduced the loss of water inventory from the SFP. The IP1 FHB pools are more than 38 years old and are constructed of reinforced concrete walls and floors sealed with an epoxy coating. The leakage is believed to result from the degradation of the epoxy coating. The licensee had previously determined that without the complete removal of existing contaminated equipment from the various pools, a thorough inspection of the pool surfaces could not be performed. In 1998, Con Edison initiated pool cleaning and hardware removal activities. Currently, Con Edison has completed the removal of hardware from one of the pools and completely emptied another. The pool that contains the fuel has not been affected. Con Edison can not inspect the pool that contains the fuel while fuel is in the pool. Pending the results of the inspections of the other pools,Con Edison will perform the appropriate repairs. If necessary, Con Edison may refurbish another pool with the expectation of transferring the fuel to the refurbished pool.

Question 2

You mentioned using boron in an attempt to find the leak. Does that mean you haven't located the leak?

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PDR ADOCK

NRC Response

The exact locations of all potential leaks have not yet been determined. However, Con Edison believes that it has located one leakage path to the north curtain drain (NCD) and has completed actions to eliminate the source of that leak. This leak is not from the pool that contains the fuel.

Question 3

Can you stop the leak? When?

NRC Response

Since 1998, Con Edison has been cleaning the various pools within the IP1 FHB. The exception to this practice is the particular pool that contains the fuel. Upon completion of this cleaning phase, Con Edison plans to perform visual examinations of the concrete surfaces of the pools. Con Edison anticipates completion of the concrete surface examination within the first quarter of the year 2000. However, based on their results, Con Edison may extend the examination period for additional inspections. Pending the results of Con Edison's evaluation of the concrete surfaces, the appropriate repairs will be performed.

Question 4

If not, why not?

NRC's Response

See our response to Question 3.

Question 5

Are there any other leaks at IP1, IP2 or IP3, either in the spent fuel pool or anywhere else?

NRC's Response

There are seven pools within the IP1 FHB that could be the source of the activity found in the NCD and sphere foundation drain (SFD). With the exception of the IP1 FHB, there are no other known leaks in IP2 or IP3 SFP. Your question regarding leaks "anywhere else" is too broad to answer; however, the facilities are operated within the limits of the Technical Specifications and the applicable requirements of Title 10 of the *Code of Federal Regulations,* (10 CFR) Part 20 that provide assurance of public health and safety.

Questions 6

What, besides tritium is leaking from the spent fuel pool at IP1?

NRC's Response

Traces of boron, cobalt-60, and cesium-137 have been found in the NCD and the SFD sumps. The NCD and SFD sumps are a continually monitored effluent pathway. After appropriate sampling, the water is permitted to be released from the facility in accordance with NRC requirements. Con Edison continues to monitor this condition and reports to the NRC regularly on this matter in the Annual Radiological Effluent and Waste Disposal report. Recent copies of this report were Federal Expressed to you in September, 1999 at your request.

In the concluding paragraph of your September 3 letter, you misquoted a statement made in my letter to you dated June 29, 1999. The average individual in the United States receives approximately 300 millirems, not 300 rems, of ionizing radiation per year. The values differ by a factor of 1000.

To date, corrective measures taken by Con Edison for suspected leakage from the SFP have been responsive to the concerns and its potential impact on public health and safety and the environment. Although the NRC's inspections to date have indicated that there is no health and safety impact on the public from suspected pool leakage, our review of future actions by Con Edison to identify and reduce leakage from the SFP will continue.

If you need additional information, please contact the NRC Project Manager, Mr. John Minns, at 301-415-3166.

Sincerely,

Suzanne C Black

John A. Zwolinski, Director
Division of Licensing Project Management
Office of Nuclear Reactor Regulation

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Sincerely,

ORIG. SIGNED BY S. BLACK
for John A. Zwolinski, Director
Division of Licensing Project Management
Office of Nuclear Reactor Regulation

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ASSIGNED TO: CONTACT:

DLPM Zwolinski

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Masnick

914 737 8364

SAFE LEGACY

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New Paltz, New York 12561
Email: safelege@ulster.net
Co-presidents: Lexsea Linardakis and Michele Riddell (914) 255-5482

Dear Mr. Minns and Zwolinski, September 3,1999

I just received the letter dated June 29,1999 which addresses the ongoing leak at Indian Point. It must have gotten lost in the mail. Thank you for forwarding me another. I am currently waiting for your annual effluent and waste disposal report.

There are some questions that I would like you to address today, as well.Please be as specific as you can. Also, bear with me. If you have answered something and I have not quite gotten it, please explain it again.

1. Why is the spent fuel pool of IP1 still leaking?
2. You mentioned using boron in an attempt to find the leak. Does that mean you haven't located the leak?
3. Can you stop the leak?When?
4. If not, why not?
5. Are there any other leaks at IP1,IP2 or IP3,either in the spent fuel pool or anywhere else?
6. What, besides tritium is leaking from the spent fuel pool at IP1?

In Mr. Zwolinski's letter he explains that the average individual receives 300rems a year from natural radiation. Precisely because of this we are concerned with any additional "unnatural radiation", however little.

Thank you for your prompt and careful consideration.

Sincerely,

c.c. Shirley Jackson

Lexsea Linardakis + Michele Riddell

Lexsea Linardakis and Michele Riddell