

**Response to Request for Information
Senator Cory A. Booker
Letter dated December 14, 2017**

- 1. It is our understanding that the dry casks and the containers housing the spent fuel will need replacement at some point in the future. Who will be responsible for the replacement and maintenance of the casks and containers after Exelon is no longer actively on site?**

Exelon, as the current holder of the license, will be responsible for safely maintaining the on-site spent fuel storage systems. NRC regulations require licensees to manage and provide funding for the management of spent fuel as long as the spent fuel remains on site.

The NRC does not consider whether the dry storage systems will require replacement before the spent fuel is shipped off site. However, after the initial 20-year license period for these systems, aging management programs would be implemented to detect the effects of aging and apply corrective actions such that the safety functions of the system are maintained. Any identified areas that indicate degradation would require the licensee to demonstrate that the dry storage system remains safe or pursue repair or other remedies to ensure that the spent fuel is safely confined. Because the NRC does not prescribe how licensees should take corrective action with respect to specific designs, any potential corrective actions for a dry cask storage system would be case-specific. The NRC does, however, evaluate whether the corrective actions taken are effective and sufficient to keep the spent fuel stored safely and that the licensees remain compliant with our regulatory requirements.

- 2. It is our understanding that the licensing of the casks is sufficient for 20 years with further renewals up to 40 years. In addition, site specific licenses are good for 40 years. At the Federal level, has there been any discussion of the licensing process after that time period?**

The NRC's regulations were revised in 2011 to allow for initial and renewal terms of up to 40 years rather than 20-year terms. The regulations do not limit the number of times an applicant can request renewal of a cask or storage system certificate, provided that the applicant demonstrates that the effects of aging on the components are adequately addressed in accordance with the regulations (10 CFR 72.240).

- 3. It is our understanding that once the plant is completely disassembled there will be no infrastructure in place to handle the repackaging of spent fuel material should the casks or containers need replacement. Is there a plan for this contingency, and what are the safety implications of reopening the cask storage?**

If safety issues are identified with a spent fuel storage system, the licensee must pursue corrective actions to ensure that the spent fuel is safely stored. As part of its regulatory oversight, the NRC evaluates whether the corrective actions are effective and sufficient to maintain the safety functions of the storage system.

If a storage canister needs to be opened, the licensee must keep the fuel confined, maintain the fuel in an arrangement that does not cause a nuclear chain reaction, and shield the workers and the public from radiation.

4. Have there been any updates or discussions regarding siting, licensing, constructing or operating interim storage for spent fuel anywhere in the U.S.?

In 2006, the NRC licensed Private Fuel Storage (PFS) to build and operate an interim spent fuel storage facility in Utah to store 44,000 tons of spent nuclear fuel. However, construction of the PFS facility has not occurred. The NRC has received two applications to construct and operate consolidated interim spent fuel storage facilities. The NRC's review of one application for a proposed facility in Texas was suspended by request of the applicant. The NRC staff is currently evaluating the other application for a proposed site in New Mexico to determine if it has sufficient information to begin the required safety and environmental reviews.

5. In the event there are permanent or interim storage facilities sited, are there site-specific plans for Oyster Creek regarding the transportation of casks, and are the casks at Oyster Creek certified for transportation?

The NRC is not aware of any plans to transport spent fuel from Oyster Creek to an offsite storage facility. Any transportation of spent fuel by the U.S. Department of Energy (DOE) would be governed by requirements specified in the Nuclear Waste Policy Act of 1982, as amended. In particular, Section 180(a) of the Act specifies that DOE is to transport spent fuel in NRC-certified transportation casks.

If, in the future, plans are developed to transport spent fuel offsite, NRC has approved a transportation cask for use with the NUHOMS 61-BT canisters used to store fuel at Oyster Creek. The transportation cask would be brought to the Oyster Creek site at the time of shipment. The certificate of compliance and safety analysis report for the transportation cask detail the NRC-approved procedures for loading the canisters into the transportation cask.¹

6. In the event that Lacey Township becomes a long term storage site, by design or necessity, who will be handling the long term handling, maintenance and security of the site?

Exelon, as the current holder of the license, will be responsible for all operations necessary for securing and safely maintaining the spent fuel at the site. Exelon must comply with the security requirements in its NRC-approved Physical Security Plan. The NRC regularly inspects implementation of security plans to ensure compliance with the associated requirements.

7. Will a private contractor be in charge of securing and maintaining the site in the future, and what are the mechanisms in place for contractor turnover, bankruptcy, liability, etc.?

Exelon may use contractors or subcontractors for work at the site, but Exelon is ultimately responsible for the secure and safe storage of the spent fuel. Licensees are required to manage and provide funding for the management of spent fuel as long as the spent fuel remains on site.

¹ NRC, Certificate of Compliance No. 9302 for the Model No. NUHOMS-MP197 Package; Revision 8, May 23, 2017 (ADAMS Accession No. ML17143A256). TN Americas, NUHOMS-MP197 Transportation Package Safety Analysis Report (Chapter 7, Operating Procedures), Revision No. 18, April 28, 2017 (ADAMS Accession No. ML17152A163).

8. What is the compensation plan of the Federal government to the communities hosting nuclear storage?

The NRC is the regulatory agency with responsibility for ensuring that licensees comply with regulations pertaining to the safe and secure storage of spent fuel. Compensation to the communities hosting nuclear storage is not addressed by our regulations.

9. Can you assist in determining what the State of New Jersey's obligation or plan is for onsite storage and compensation?

The NRC can only speak to obligations associated with the NRC and NRC licensees. In that regard, Exelon, as the current holder of the license to store spent fuel at Oyster Creek Generating Station, is responsible for complying with all NRC regulations as long as the spent fuel is stored onsite.