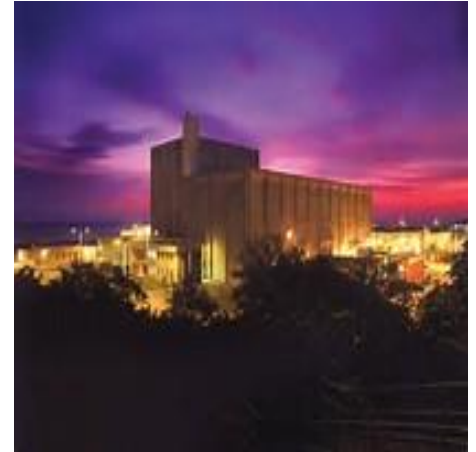




Pilgrim Nuclear Power Station Plant Status and Decommissioning Plan Update

May 24, 2017





Introductions

Joseph R. Lynch
Sr. Manager, Government Affairs
Decommissioning - EWC



Plant Status

Plant Status

- Pilgrim Station began its 21st and final Refueling Outage (RFO-21) on Sunday, April 9th, 2017.
- Pilgrim synchronized to the grid on Monday, May 22nd after upgrading, replacing, and inspecting hundreds of pieces of equipment as well as refueling the plant.
- Entergy invested over \$54 million (equipment & salaries) during the RFO with the support of more than 800 skilled, temporary workers to assist the plant's 620 full-time employees.
- Pilgrim has operated safely for more than 40 years. The extensive work performed during the refueling period ensures the plant will continue to operate safely until our shutdown no later than June 1, 2019.



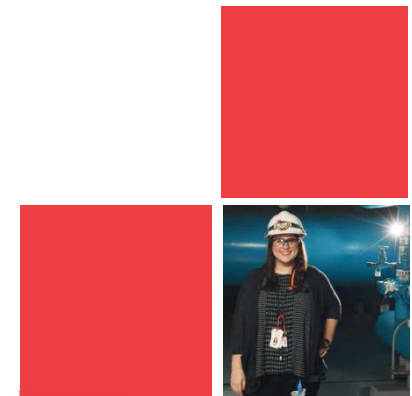
Regulatory Update

- NRC Phase C IP95003 on-site inspection activities completed in January.
- The NRC Annual Assessment letter was issued on March 3rd concluding that overall performance at Pilgrim preserved public health and safety.
- On March 21st, the NRC held a public meeting for the Pilgrim 2016 Annual Assessment and exit meeting for the IP95003 Inspection.
- The NRC IP95003 Inspection Report was issued on May 10th, concluding “...programs and processes at PNPS adequately supported nuclear safety and that PNPS should remain in Column 4.”
- This will be followed by a Confirmatory Action Letter (CAL) in the early summer.



Regulatory Update (Cont'd)

- On April 5th, the Massachusetts Land Court ruled that the zoning permit for the Pilgrim Dry Fuel Storage pad was issued per town requirements and no special permit was required.

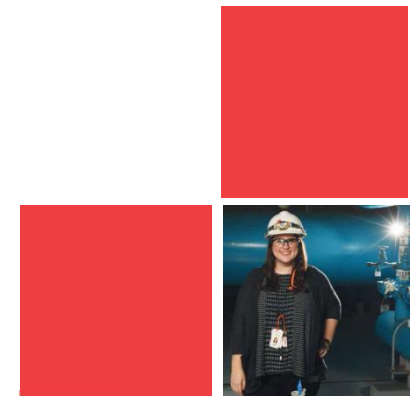




Decommissioning Planning

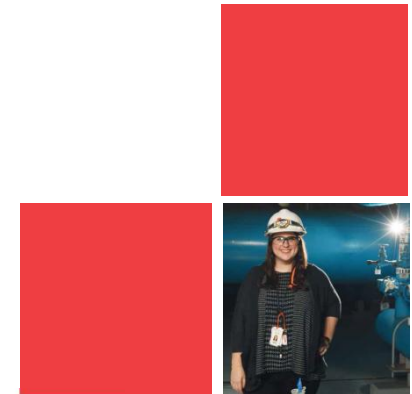
Upcoming Milestones

- A dedicated Decommissioning Planning Organization (DPO) will be formed to support readiness for decommissioning including key submittals and NRC License changes. This team will focus on decommissioning, separate from the staff safely operating the plant.
- A Decommissioning website will be created and maintained as a library of key submittals, communications and updated information on the decommissioning process.



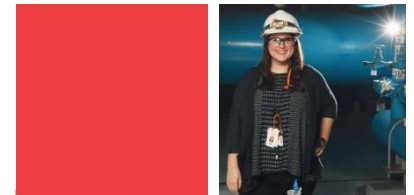
Upcoming Milestones (Cont'd)

- A Post-Shutdown Decommissioning Activities Report (PSDAR), Site-Specific Decommissioning Cost Estimate, and Irradiated (Spent) Fuel Management Plan Update will be submitted to the NRC at a date to be determined near/after the shutdown date.
- Pilgrim will certify by letter to the NRC that the reactor has permanently ceased operations and was permanently defueled.
- Pilgrim will exit the NRC Reactor Oversight Process (ROP) and commence the Decommissioning Inspection Program after cessation of operations.

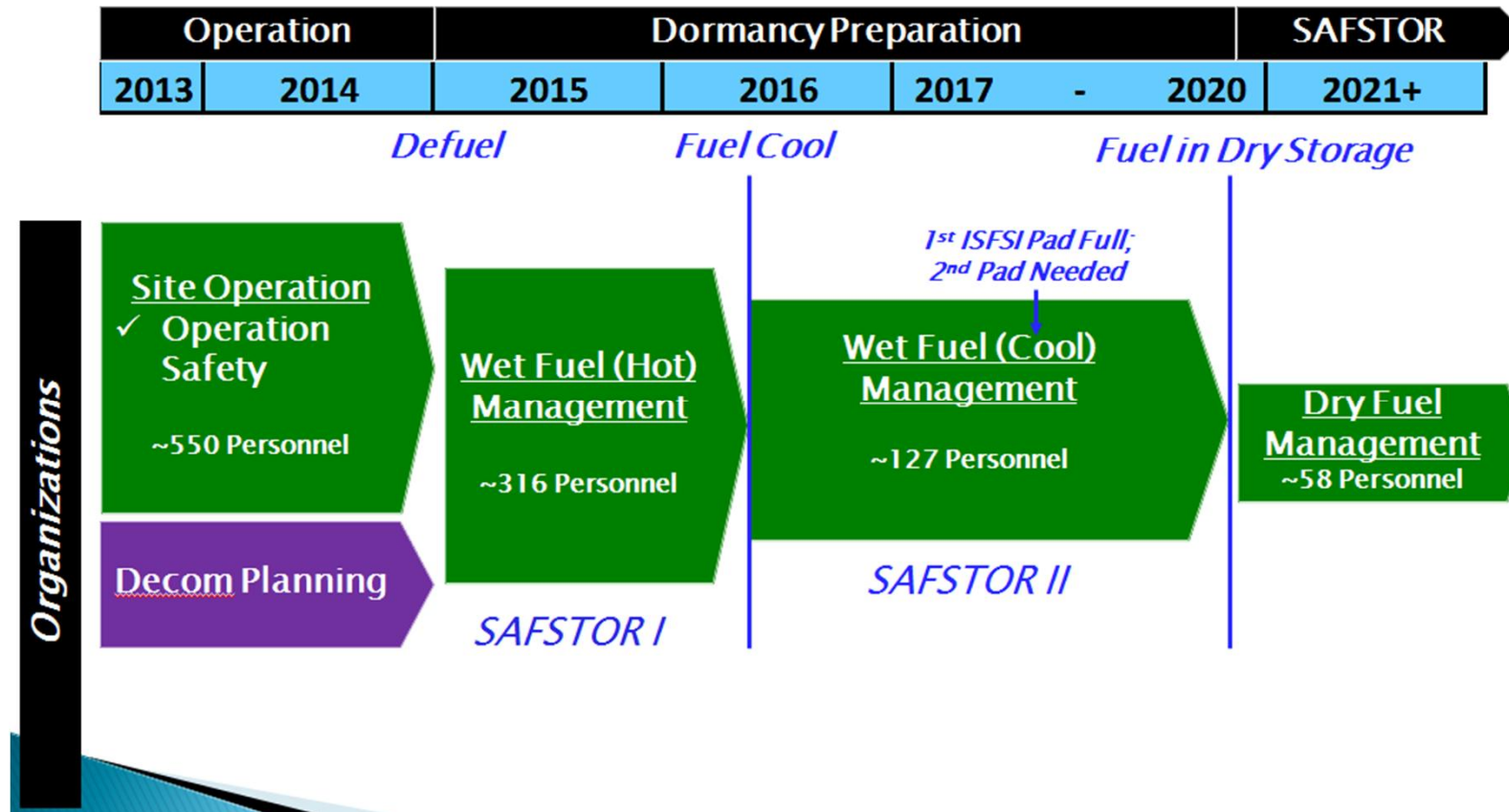


NRC Allowed Decommissioning Strategies

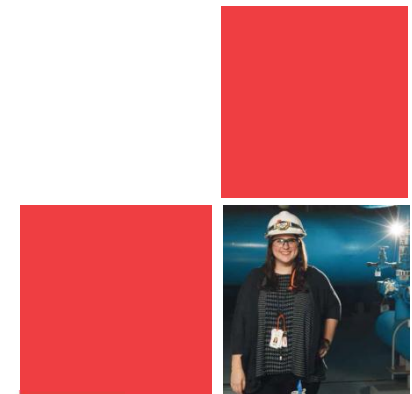
- A Licensee may select from three decommissioning strategies:
 - DECON (immediate dismantling), soon after the nuclear facility closes, equipment, structures, and portions of the facility containing radioactive contaminants are removed or decontaminated to a level that permits release of the property and termination of the NRC license.
 - SAFSTOR (deferred dismantling), a nuclear facility is maintained and monitored in a condition that allows the radioactivity to decay; afterwards, the plant is dismantled and the property decontaminated.
 - ENTOMB, radioactive contaminants are permanently encased on site in structurally sound material such as concrete. The facility is maintained and monitored until the radioactivity decays to a level permitting restricted release of the property. To date, no NRC-licensed facilities have requested this option.



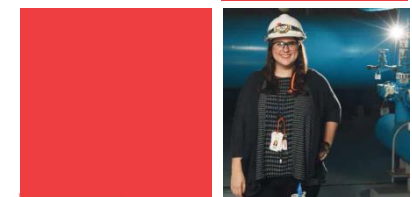
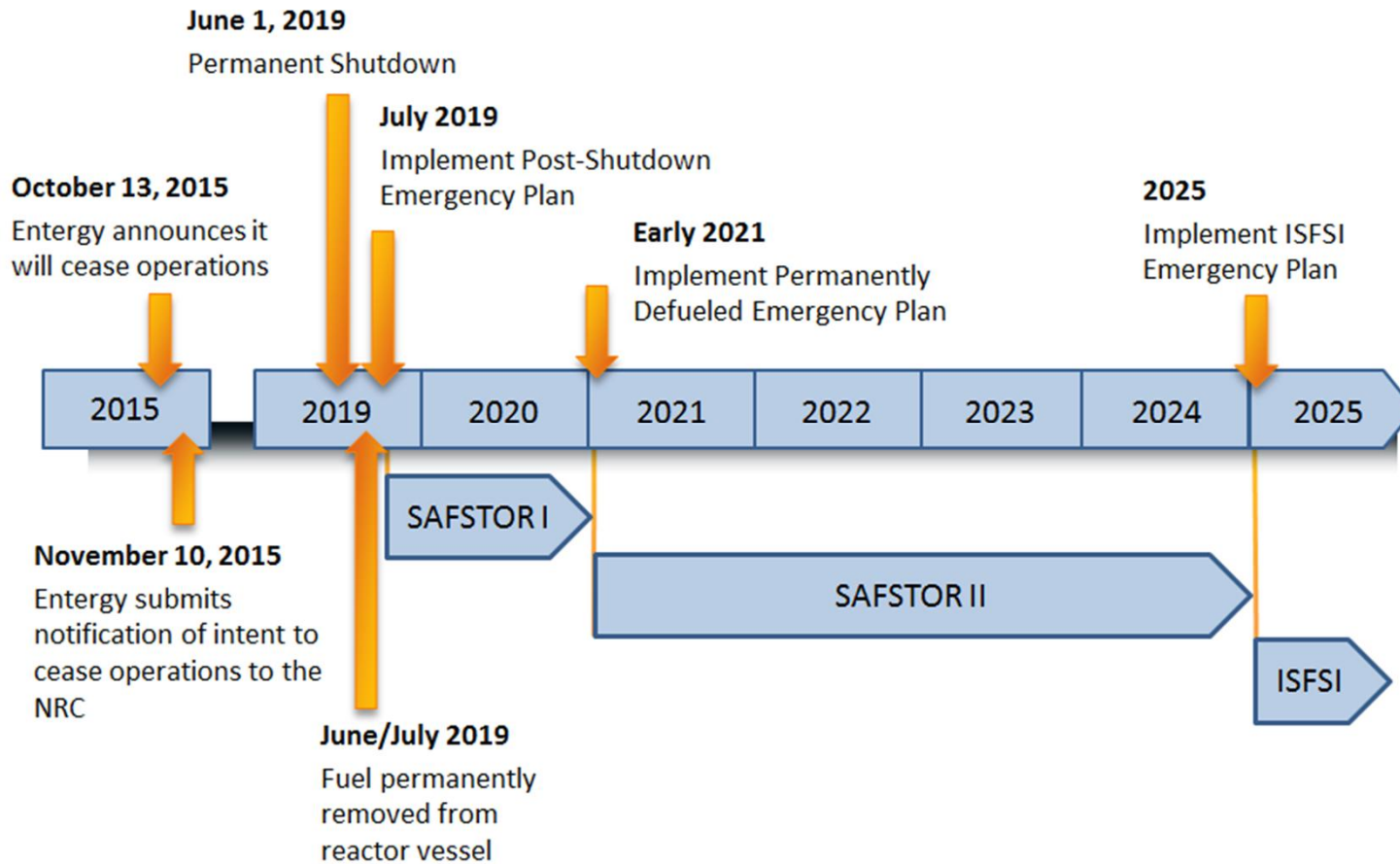
Staffing Transition to Decommissioning (VY)



This graphic is from Vermont Yankee and provided for illustrative purposes only



Draft Pilgrim Staffing Timeline



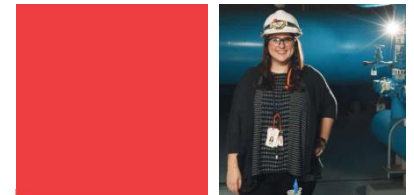
Post-Shutdown Decommissioning Activities Report

Requirements/Guidance

- 10 CFR 50.82(a)(4)
- NRC Regulatory Guide 1.185, Revision 1 (June 2013)
- Review of recent PSDAR submittals to the USNRC by plants in decommissioning
- Written by an experienced team including TLG Services and PNPS Decommissioning Planning Organization.

PSDAR Content

- Description of Planned Decommissioning Activities
- Decommissioning Schedule
- Decommissioning Cost Estimate (DCE)
- Discussion of Environmental Impacts



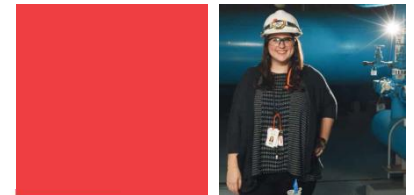
Irradiated Fuel Management Plan

Requirements/Guidance

- 10 CFR 50.54 (bb)
- NRC review is conducted in accordance with its standard process

Irradiated Fuel Management Plan Content

- Written notification will be submitted to USNRC discussing changes to the Pilgrim Program for Management of Irradiated Fuel.
- Program by which Pilgrim intends to manage and provide funding for the management of all spent nuclear fuel until it is transferred to the Department of Energy for ultimate disposal.
- Will describe Pilgrim plan to move the fuel from the Spent Fuel Pool (Wet Storage) to the ISFSI (Dry Storage).



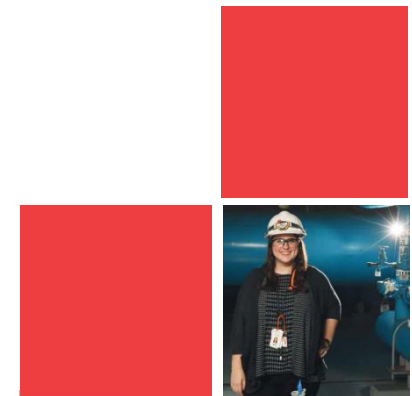
Decommissioning Cost Estimate (DCE)

Requirements/Guidance

- 10 CFR 50.75(c), 10 CFR 72.30, 10 CFR 50.54(bb)
- TLG Services cost estimating model and data
- Plant specific data from walk downs and plant design info

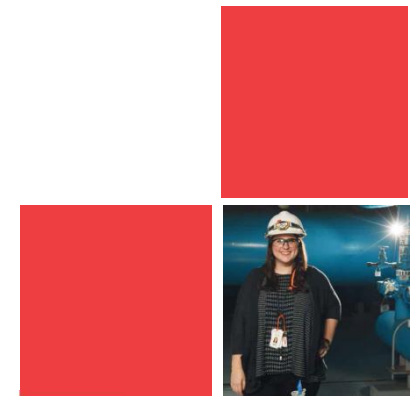
DCE Content

- Discusses the Decommissioning Plan assumptions
- Specific Costs for:
 - NRC License Termination
 - Spent Fuel Management (SFM)
 - Site Restoration
- Provides Total Costs by Decommissioning Period



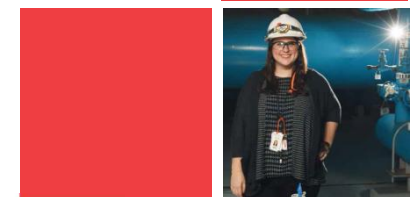
Nuclear Decommissioning Trust Update

- The Pilgrim Decommissioning Trust (NDT) balance was approximately \$1 Billion on March 31, 2017.



Open Communication and Transparency

- Nuclear Decommissioning Citizens Advisory Panel (NDCAP) Quarterly Meetings
- Stakeholder Outreach
 - Small Group Meetings/Local Towns and the Cape
 - Continued Community Involvement
- Updates provided to news media
- Tours for Key Stakeholders
- Future Pilgrim Decommissioning Website
 - Digital Media & Social Media Updates





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