



NorthStar Vallecitos, LLC
6705 Vallecitos Rd.
Sunol, Ca 94586
www.northstar.com

Luke M. Self
Vice President, NorthStar Vallecitos

10 CFR 50.82(a)(9)

NSV 25-001

February 3, 2025

ATTN: Document Control Desk
U.S. Nuclear Regulatory Commission
Washington, DC 20555-0001

SUBJECT: Application to Terminate License for the Vallecitos Boiling Water Reactor
Vallecitos Nuclear Center
Docket No. 50-18
License No. DPR-1

- REFERENCES:
1. Letter, USNRC to GEH, "GE Hitachi Nuclear Energy, Vallecitos Nuclear Center - Response to the Description for Decommissioning the Shutdown Reactors," dated April 8, 2022, (ML22066A569).
 2. Letter, GEH to USNRC, "Vallecitos Nuclear Center Decommissioning Limited Post Shutdown Decommissioning Activities Report" (ML22264A324(P)), dated September 21, 2022.
 3. Letter, GEH to USNRC, "License Termination Plan for the Vallecitos Boiling Water Reactor License DPR-1," dated September 7, 2023 (ML23250A267)
 4. Letter, GEH to USNRC, "License Termination Plan for the Vallecitos Boiling Water Reactor license DPR-1 (Public)," dated September 15, 2023 (ML23261A591)
 5. Email, GEH to USNRC, "GEH Vallecitos Nuclear Center, E-mail: Response to acceptance Review of the VBWR License Termination Plan," dated October 31, 2023 (ML23304A300).
 6. Letter, GEH to USNRC, "GEH/NorthStar Response to NRC Request for Additional Information Regarding License Termination Plan VBWR," dated March 25, 2024 (ML24085A792)
 7. Letter, USNRC to GEH, "Issuance of Amendment to Vallecitos Boiling Water Reactor Renewed Facility License to add License Termination Plan License Condition," dated November 27, 2024, (ML24304B569, ML24305A081 and ML24326A145).
 8. Letter, USNRC to GEHA Regulatory Affairs., "Order Approving Transfer of the Vallecitos Nuclear Center Licenses and Conforming License Amendment (EPID L-2023-LLO-0002)," dated April 25, 2024 (ML24039A019)

NorthStar Vallecitos, LLC (NSV) hereby requests the termination of Vallecitos Boiling Water Reactor (VBWR) license DPR-1.

It is the intent of NSV to decommission the VBWR and Empire State Atomic Development Agency (ESADA) Vallecitos Experimental Superheat Reactor (EVESR) and terminate their NRC licenses DPR-1 and DR-10, respectively. This decommissioning and license termination will be conducted in accordance with the applicable requirements of 10 CFR 50.82 as identified in (Reference 1), removing and disposing of materials and decontaminating both facilities meeting conditions for unrestricted release in accordance with the criteria for decommissioning in 10 CFR 20.1401 and 20.1402.

In support of this licensing approach to terminate the VBWR license, a Limited Post-Shutdown Decommissioning Activities Report (LPSDAR) (Reference 2) was submitted as a means of demonstrating compliance with the intent of 10 CFR 50.82(a)(6) and 10 CFR 50.82(a)(7) and the VBWR has transitioned into active deactivation and decommissioning.

Secondly, on September 7, 2023 (Reference 3), as supplemented by correspondence dated September 15, 2023 (Reference 4), October 31, 2023 (Reference 5) and March 25, 2024 (Reference 6), GEH submitted to the NRC a License Termination Plan (LTP) for the Vallecitos Boiling Water Reactor (VBWR). This LTP submittal was to facilitate termination of the VBWR license and to allow for the holistic decommissioning of both the VBWR and the EVESR under the EVESR DR-10 license. This LTP was subsequently approved by the NRC on November 27, 2024 (Reference 7).

This letter implements the final phase of licensing decommissioning strategy that was outlined in the LPSDAR and LTP. Specifically, Attachment 1 to this letter is a request to terminate the VBWR License and to transfer the remaining VBWR facility and in situ radioactive material to the EVESR license.

Also contained within Attachment 1 is a request for an exemption to 10 CFR 50.82(a)(11)(ii) for the VBWR final radiation survey and associated documentation to demonstrate that the facility meets the criteria for license termination in 10 CFR 20, Subpart E. This exemption will facilitate the final termination of the VBWR license and subsequent decommissioning of the VBWR and EVESR sites together.

It is noted that under separate letterhead, a license amendment request will be submitted for the EVESR license (DR-10) to accept any VBWR in situ radioactive material. The target date for this submittal is March 7, 2025.

By letter dated April 25, 2024 (Reference 8), the USNRC transmitted an Order that provided consent to the direct transfer of the Vallecitos Nuclear Center (VNC) licenses from GE-Hitachi Nuclear Energy Americas, LLC (GEHA) to NSV. While this submittal precedes the license transfer from GEH to NSV, GEH authorizes NRC action on this request. Reference the letter from GEH addressed to the NRC provided as Attachment 2.

This letter contains no new regulatory commitments.

Should you have any questions concerning this letter, or require additional information, please contact Mr. Thomas B. Silko at (802) 451-5354, Ext 2506.

I declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge.

Sincerely,

Luke M. Self

Signature

2/3/25

Executed On (Date)

Luke M. Self,
Vice President, NorthStar Vallecitos

Attachment 1: Request to Terminate the VBWR License.

Attachment 2: Letter, GEH to NRC, "NorthStar Vallecitos (NSV) Authorization," dated January 30, 2025.

cc: Director, Office of Nuclear Material Safety and Safeguards
U.S. Nuclear Regulatory Commission
Washington, DC 20555

Regional Administrator, Region 4
U.S. Nuclear Regulatory Commission
1600 East Lamar Boulevard
Arlington, Texas 76011-4511

Radioactive Materials Licensing Section, Radiologic Health Branch, California
Department of Public Health

Attachment 1

Vallecitos Boiling Water Reactor

Request to Terminate the VBWR License
(6 pages excluding this cover sheet)

1. Request to Terminate the VBWR License

(a) Introduction

The Vallecitos Nuclear Center (VNC) site is located at 6705 Vallecitos Road (north side of State Route 84) in Sunol, Alameda County, California. The site is east of San Francisco Bay, approximately 35 air miles east-southeast of San Francisco and 20 air miles north of San Jose. The properties surrounding the site are primarily used for agriculture and cattle raising, with some residences, which are mostly to the west of the property. The Vallecitos Boiling Water Reactor (VBWR) and Empire State Atomic Development Agency (ESADA) Vallecitos Experimental Superheat Reactor (EVESR) licensed area, also known as the 300 area, is approximately 3.2 acres within the 105.8-acre Site Developed Area. Maps of the facility as well as the 300 area were included as Figures 2-1 and 2-2 of Reference 1.

The VBWR (DPR-1 Docket 50-18) and EVESR (DR-10 Docket 50-183) are licensed as power reactors under 10 CFR 50, "Domestic Licensing of Production and Utilization Facilities." Both units have permanently ceased operation and are in SAFSTOR with all nuclear fuel removed from the respective reactor vessels of both units. In addition, the VBWR reactor vessel has been removed from the facility. These units are awaiting the termination of the power reactor licenses.

This application implements the final phase of licensing decommissioning strategy that was outlined in the Limited Post Shutdown Decommissioning Activities Report (LPSDAR) (Reference 1) and the approved License Termination Plan (Reference 2). This strategy allows for the termination of the VBWR license when (1) the NRC's requirements for terminating a power reactor license have been satisfied, and (2) the amendment to the EVESR is issued accepting the transfer of all residual radioactive materials associated with the VBWR license. These two requirements are addressed below.

(b) Requirements to Terminate a Power Reactor License

10 CFR 50.82(a)(11) states:

The Commission shall terminate the license if it determines that—

- (i) The remaining dismantlement has been performed in accordance with the approved license termination plan, and
- (ii) The final radiation survey and associated documentation, including an assessment of dose contributions associated with parts released for use before approval of the license termination plan, demonstrate that the facility and site have met the criteria for decommissioning in 10 CFR part 20, subpart E.

i) Compliance with License Termination Plan

GEH submitted to the NRC a License Termination Plan (LTP) for the Vallecitos Boiling Water Reactor (VBWR) on September 7, 2023 (Reference 3), as supplemented by docketed correspondence dated September 15, 2023 (Reference 4), e-mail dated October 31, 2023 (Reference 5), and March 25, 2024 (Reference 6). The environmental portion of the LTP was reviewed and accepted by the NRC on September 30, 2024 (Reference 7). The VBWR LTP was subsequently approved by the NRC on November 27, 2024 (Reference 2). The actions identified in the LTP have

been completed which primarily involved the removal of the VBWR reactor vessel. Any further decommissioning of the VBWR will be performed under the EVESR license.

ii) Terminal Radiation Survey and Associated Documentation

It was never the purpose of the NRC approved VBWR LTP to remove radioactive material from the VBWR to the point that the decommissioning requirements of Subpart E would be fully satisfied. Rather, the purpose of the VBWR LTP was to dismantle and remove VBWR components to the point that there would no longer be a utilization (reactor) facility remaining on the site (reactor vessel removed), and the residual radioactive materials, structures, and equipment associated with the VBWR could be transferred to the EVESR license for further remediation to the extent necessary.

The residual radioactive materials, structures, and equipment associated with the VBWR, along with other buildings and lands covered by the EVESR license, will be decommissioned by NorthStar Vallecitos, LLC (NSV) as Subpart E of 10 CFR 20 requires. In its application to amend the EVESR license¹, NSV acknowledges that it will have the responsibility to satisfy the NRC's decommissioning requirements applicable to the EVESR and VBWR license area, including requirements applicable to the residual radioactive materials and structures, materials and equipment associated with the VBWR.

Since the release criteria of 10 CFR 20 will not be satisfied prior to the termination of the VBWR License, an exemption request from the requirements 10 CFR 50.82(a)(11)(ii) follows.

2) Request for Exemption from 10 CFR 50.82(a)(11)(ii)

NorthStar Vallecitos, LLC (NSV) hereby requests an exemption for the criteria of 10 CFR 50.82(a)(11)(ii) which provides the requirement that a power reactor facility meet the decommissioning criteria in 10 CFR 20, subpart E before a license can be terminated. Specifically, NSV requests that the VBWR license be terminated prior to determining that the release criteria of 10 CFR 20.1402 be satisfied.

The provisions of 10 CFR 50.12(a)(1) and (a)(2) allow specific exemptions from the requirements of 10 CFR 50 provided the exemption is authorized by law, will not present any undue risk to public health and safety, would be consistent with the common defense and security and special circumstances are present. The requested exemption satisfies the requirements of 10 CFR 50.12 and provides no danger to life, property, or the common defense and security.

¹ NSV shall promptly submit under separate letterhead a license amendment request for the EVESR to accept the transfer of the in-situ VBWR radioactivity.

(a) The exemption is authorized by law

10 CFR 50.12 allows the NRC to grant exemptions from the requirements of 10 CFR Part 50, therefore granting the proposed exemption is consistent with the Atomic Energy Act of 1954, as amended, and the Commission's regulations. Thus, the exemption would be authorized by law.

(b) The exemption will not present an undue risk to public health and safety

The requested exemption does not create a new accident precursor or result in an increase in the probability of any postulated accident. The requested exemption does not result in an increase in the consequences of postulated accidents. The requested exemption does not result in any change to the types or amounts of effluents that may be released offsite or be allowed to remain on site since the in situ radioactive material will be transferred to the EVESR. Implementation of this exemption request would not result in an increase of cumulative occupational or public doses. Therefore, the requested exemption does not result in undue risk to public health and safety.

(c) Exemption is consistent with the common defense and security

The requested exemption does not alter the scope or implementation of the NorthStar Vallecitos Physical Security Plan and does not affect any other requirements related to the security of the facility. Therefore, the common defense and security is not impacted by the requested exemption.

(d) Special Circumstances

Pursuant to 10 CFR 50.12(a)(2), the NRC may grant an exemption if the licensee satisfies at least one of several enumerated "special circumstances." In this regard, NSV maintains that the special circumstance is that the application of 10 CFR 52.82(a)(11)(ii) in this case is unnecessary to achieve the underlying purpose of the rule, which is to provide for safe decommissioning and license termination. The basis for this finding is that the EVSRS license will be assuming complete responsibility for the safe decommissioning of both the VBWR and EVESR licensed areas concurrently.

(e) Environmental Considerations / Categorical Exclusion

The proposed exemption satisfies the eligibility criterion for categorical exclusion set forth in 10 CFR 51.22(c)(25), as there are no significant environmental impacts associated with the proposed action. The proposed exemption does not:

- Involve a significant hazards consideration;
- Change the types or increase the effluents released offsite;
- Increase the occupational or public radiation exposure;
- Involve any construction or other ground disturbing activities;
- Increase the potential for or consequences from radiological accidents;
- The requirements from which the exemption is sought involves (G) Scheduling requirements.

(i) No Significant Hazards Consideration Determination

NorthStar Vallecitos, LLC (NSV) has evaluated the proposed exemption to determine whether a significant hazards consideration is involved by focusing on the three standards set forth in 10 CFR 50.92(c) as discussed below:

1. Does the proposed exemption involve a significant increase in the probability or consequences of an accident previously evaluated?

Response: No

The proposed exemption has no effect on structures, systems, and components (SSCs) and no effect on the capability of any facility SSC to perform its design function. The proposed exemption would not increase the likelihood of the malfunction of any facility SSC. The form, fit and function of facility SSC's are not affected, as their operation remains unchanged by this exemption request.

The probability of occurrence of previously evaluated accidents is not increased, since the exemption request involves satisfying the release requirements of 10 CFR 20.1402 at a later date as part of the license termination of the EVESR.

Therefore, the proposed exemption does not involve a significant increase in the probability or consequences of an accident previously evaluated.

2. Does the proposed exemption create the possibility of a new or different kind of accident from any accident previously evaluated?

Response: No

The proposed exemption does not involve a physical alteration of the facility, only a change to the schedule when the release criteria of 10 CFR 20.1402 will be satisfied. No new or different type of equipment will be installed and there are no physical modifications to existing SSCs associated with the proposed exemption. Similarly, the proposed exemption will not physically change any SSCs involved in the mitigation of any accidents. Thus, no new initiators or precursors of a new or different kind of accident are created. Furthermore, the proposed exemption does not create the possibility of a new accident as a result of new failure modes associated with any equipment or personnel failures. No changes are being made to setpoints which initiate protective or mitigative actions, and no new failure modes are being introduced.

Therefore, the proposed exemption does not create the possibility of a new or different kind of accident from any accident previously evaluated.

3. Does the proposed exemption involve a significant reduction in a margin of safety?

Response: No

The proposed exemption does not impact facility operation or any SSC that is relied upon for accident mitigation. This proposed exemption would allow for a schedule change to when the release criteria of 10 CFR 20.1402 is satisfied.

Therefore, the proposed exemption does not involve a significant reduction in a margin of safety.

Based on the above, NSV concludes that the proposed exemption presents no significant hazards consideration, and, accordingly, a finding of "no significant hazards consideration" is justified.

- (ii) There is no significant change in the types or significant increase in the amounts of any effluents that may be released offsite.

There are no changes in the types, characteristics, or quantities of effluents discharged to the environment associated with the proposed exemption. There are no materials or chemicals introduced into the facility that could affect the characteristics or types of effluents released offsite. In addition, the method of operation of waste processing systems will not be affected by the exemption. The proposed exemption will not result in changes to the design basis requirements of SSCs that function to limit or monitor the release of effluents. Therefore, the proposed exemption will result in no significant change to the types or significant increase in the amounts of any effluents that may be released offsite.

- (iii) There is no significant increase in individual or cumulative public or occupational radiation exposure.

The proposed exemption does not involve any physical alterations to the facility configuration or any changes to the operation of the facility that could lead to a significant increase in individual or cumulative occupational radiation exposure.

- (iv) There is no significant construction impact.

No construction activities are associated with the proposed exemption.

- (v) There is no significant increase in the potential for or consequences from radiological accidents.

See the no significant hazards considerations discussion in Item (i)(1) above.

- (v) The requirements from which an exemption is sought involve (G) Scheduling requirements. Specifically, the NSV intends to satisfy the release criteria of 10 CFR 20.1402 for the VBWR during the license termination process for the EVESR. The exemption request does not alter the release criteria values, only the timing when the verification is satisfied. The property of the VBWR will continue to satisfy the release criteria of 10 CFR 20.1402 prior to the property being made available to the public.

Because the VBWR in-situ radioactive materials will remain under the EVESR power reactor license also held by NSV, the material will be fully subject to appropriate regulatory authority and control. Accordingly, NSV believes that the requirements of 10 CFR 50.12(a)(1) and (a)(2) have been satisfied.

3) Conclusion

This submittal is consistent with Reference 8 which provides a description for decommissioning the VNC shutdown reactors. In addition, the termination of the VBWR license and the granting of the requested exemption is consistent with prior NRC practice (Reference 9).

References:

1. Letter, GEH to USNRC, "Vallecitos Nuclear Center Decommissioning Limited Post Shutdown Decommissioning Activities Report," (ML22264A324(P)), dated September 21, 2022.
2. Letter, USNRC to GEH, "Issuance of Amendment to Vallecitos Boiling Water Reactor Renewed Facility License to add License Termination Plan License Condition," (ML24304B569, ML24305A081, ML24326A145 or ML24348A094(P)), dated November 27, 2024.
3. Letter, GEH to USNRC, "License Termination Plan for the Vallecitos Boiling Water Reactor License DPR-1," dated September 7, 2023 (ML23250A267).
4. Letter, GEH to USNRC, "License Termination Plan for the Vallecitos Boiling Water Reactor license DPR-1 (Public)," dated September 15, 2023 (ML23261A591).
5. Email, GEH to USNRC, "GEH Vallecitos Nuclear Center, E-mail: Response to acceptance Review of the VBWR License Termination Plan," dated October 31, 2023 (ML23304A300).
6. Letter, GEH to USNRC, "GEH/NorthStar Response to NRC Request for Additional Information Regarding License Termination Plan VBWR," dated March 25, 2024 (ML24085A792).
7. NRC document "Environmental Assessment for the License Termination Plan for the Vallecitos Boiling Water Reactor at the General Electric Vallecitos Nuclear Center, Sunol, California," dated September 30, 2024 (ML24274A192).
8. Letter, USNRC to GEH, "GE Hitachi Nuclear Energy, Vallecitos Nuclear Center - Response to the Description for Decommissioning the Shutdown Reactors," dated April 8, 2022, (ML22066A569).
9. Letter, USNRC to CBS Corporation, "Request to Terminate the TR-2 License, and Grant an Exemption from 10 CFR 50.82(B)(6)(ii), Docket No. 50-022," dated September 19, 2008 (ML081330398).

Attachment 2

Vallecitos Boiling Water Reactor

Letter, GEH to NRC, "NorthStar Vallecitos (NSV) Authorization," dated January 30, 2025.

(2 pages excluding this cover sheet)



HITACHI

GE Hitachi Nuclear Energy

Phillip D. Ollis
Manager, Facility Licensing

3901 Castle Hayne Road
P.O. Box 780
Wilmington, NC 28402
USA

T (910) 616-4018
Phillip.ollis@ge.com

M250039

January 30, 2025

ATTN: Document Control Desk
U.S. Nuclear Regulatory Commission
One White Flint North
11555 Rockville Pike
Rockville, MD 20852

Nuclear Test Reactor (NTR)
License No. R-33
NRC Docket No. 50-73

Vallecitos Boiling Water Reactor (VBWR)
License No. DPR-1
NRC Docket No. 50-18

ESADA Vallecitos Experimental Superheat Reactor (EVESR)
License No. DR-10
NRC Docket No. 50-183

General Electric Test Reactor (GETR)
License No. TR-1
NRC Docket No. 50-70

Vallecitos Nuclear Center
License No. SNM-960
NRC Docket No. 70-754

Subject: NorthStar Vallecitos (NSV) Authorization

References:

- 1) Application for Consent to Direct Transfer of Control of License and Related Conforming License Amendments, September 1, 2023 (ML23244A247)
- 2) Order Approving Transfer of Licenses and Conforming License Amendments, April 25, 2024 (ML24039A021)
- 3) Letter, GEHA / NorthStar to USNRC, "GEHA/NorthStar Response to NRC Request for Additional Information Regarding Direct Transfer of VNC Licenses," dated January 22, 2024 (ML24022A323)

NSV Authorization
January 30, 2025

On September 1, 2023, NorthStar Vallecitos, LLC (“NSV”) and GE Hitachi Nuclear Energy Americas, LLC (“GEHA”) (together, “Applicants”) sought the NRC’s consent to the direct transfer of control of five NRC licenses: (1) Facility Possession-Only License No. TR-1 for the General Electric Test Reactor (“GETR”), (2) Facility Possession-Only License No. DR-10 for the ESADA Vallecitos Experimental Superheat Reactor (“EVESR”), (3) Facility Possession-Only License No. DPR-1 for the Vallecitos Boiling Water Reactor (“VBWR”), (4) Facility License No. R-33 for the Nuclear Test Reactor (“NTR”), and (5) Materials License No. SNM-960 (collectively, the “Licenses”) held by GEHA for the Vallecitos Nuclear Center in Sunol, CA (“Vallecitos”).

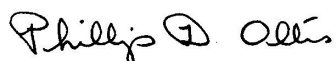
Applicants sought the NRC’s consent for the direct transfer of the Licenses from GEHA to NSV in connection with a proposed transaction under which the ownership of and licensed responsibility for the Vallecitos Nuclear Center would be transferred to NorthStar Vallecitos.

On April 25, 2024, the Nuclear Regulatory Commission (“NRC”) issued an order consenting to the transfer of control as part of the Transaction (Reference 2). As the transfer of the facility has been delayed, NRC has requested documentation demonstrating that NSV is acting on behalf of General Electric Hitachi, LLC pending the completion of the license transfer (currently expected in February 2025).

Accordingly, this letter captures that the submittals provided by NSV are in the best interest of VNC and that GEH requests that related correspondence be acted upon by the NRC as if NSV were the current licensee. This includes, but is not limited to NSV’s September 26, 2024, license amendment request, the yet to be submitted request to terminate the Vallecitos Boiling Water Reactor (VBWR) license and corresponding exemption request; and/or the Empire State Atomic Development Agency (ESADA) Vallecitos Experimental Superheat Reactor (EVESR) License Amendment Request for the EVESR to accept the in-situ radioactive material from the VBWR

Please contact me if you have any questions regarding this information.

Sincerely,



Phillip D. Ollis
Regulatory Affairs – Facility Licensing