



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

February 27, 2020

Mr. Zackary W. Rad  
Director, Regulatory Affairs  
NuScale Power, LLC.  
1100 Circle Boulevard, Suite 200  
Corvallis, OR 97330

SUBJECT: FINAL SAFETY EVALUATION FOR NUSCALE POWER, LLC TOPICAL REPORT  
TR-0716-50351, REVISION 1, "NUSCALE APPLICABILITY OF AREVA METHOD  
FOR THE EVALUATION OF FUEL ASSEMBLY STRUCTURAL RESPONSE TO  
EXTERNALLY APPLIED FORCES"

Dear Mr. Rad:

By letter dated September 30, 2016, NuScale Power, LLC (NuScale), submitted Topical Report (TR)-0716-50351, "NuScale Applicability of AREVA Method for the Evaluation of Fuel Assembly Structural Response to Externally Applied Forces," Revision 0, to the U.S. Nuclear Regulatory Commission (NRC). NuScale asked the NRC to review and approve the use of AREVA's methodology as described in ANP-10377P-A, "PWR Fuel Assembly Structural Response to Externally Applied Dynamic Excitations," Revision 0, dated April 30, 2018, for the NuScale design. By letter dated December 19, 2019, NuScale submitted Revision 1, TR-0716-50351, which incorporated changes from request for additional information responses.

The NRC staff has evaluated TR-0716-50351, Revision 1, and found that it is acceptable for referencing licensing applications for the NuScale small modular reactor design to the extent specified and under the conditions and limitations delineated in the enclosed safety evaluation report (SER).

The NRC staff requests that NuScale publish the applicable version(s) of the SER listed above within three months of receipt of this letter. The accepted version of the TR shall incorporate this letter and the enclosed SER and add "-A" (designated accepted) following the report identification number.

CONTACT: Bruce M. Bavo!, NRR/DNRL  
301-415-6715

If the NRC staff's criteria or regulations change, and its acceptability conclusion in the SER is invalidated, NuScale and/or the applicant referencing the SER will be expected to revise and resubmit its respective documentation, or submit justification for continued applicability of the SER without revision of the respective documentation.

Prior to placing the public version of this document in the publicly available records component of NRC's Agencywide Documents and Access Management System (ADAMS), the NRC staff requests that NuScale perform a final review of the SER for proprietary or security related information not previously identified. If you believe that any additional information meets the criteria, please identify such information line-by-line and define the basis pursuant to the criteria established in Title 10 of the *Code of Federal Regulations*, Part 2, Section 3.90, "Public inspections, exemptions, requests for withholding."

If after a 10-day period, you do not request that all or portions of the SER be withheld from public disclosure, the SER will be made available for public inspection through the publicly available records component of NRC's ADAMS.

If you have any questions or comments concerning this matter, please contact Bruce Baval at 301-415-6715 or via e-mail address at [Bruce.Baval@nrc.gov](mailto:Bruce.Baval@nrc.gov).

Sincerely,

/RA/

Anna H. Bradford, Director  
Division of New and Renewed Licenses  
Office of Nuclear Reactor Regulation

Docket No. 52-048

Enclosures:

1. TR-0716-50351 SER (Public)
2. TR-0716-50351 SER (Proprietary)

cc: DC NuScale Power, LLC Listserv (w/o Enclosure 2)

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DATED: February 27, 2020

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