

June 5, 2015

Dale Atkinson, Chief Operating Officer/
Chief Nuclear Officer
NuScale Power, LLC
1100 NE Circle Blvd., Suite 200
Corvallis, Oregon 97330

SUBJECT: KEY ISSUE RESOLUTION TO SUPPORT THE NUSCALE DESIGN
CERTIFICATION REVIEW

Dear Mr. Atkinson:

The purpose of this letter is to provide the U.S. Nuclear Regulatory Commission (NRC) staff's assessment of the actions needed on the part of NuScale regarding key information to be submitted, and the timing of those submittals, to support submittal of the NuScale design certification application. By way of this letter, the NRC is also identifying actions for NuScale to take to solicit NRC views/positions on key issues. While the NRC's primary role in licensing reviews is focused on safety, early resolution of the NuScale reactor key issues will allow a schedule for review of the design certification application to be developed and achieved.

In an April 21, 2015, meeting, NuScale presented their preparation status and schedule for submittal of the NuScale reactor design certification application. The staff's summary of the meeting is provided in the enclosure to this letter. The staff acknowledges the preparatory work demonstrated in the presentations provided by NuScale and the enhanced specificity regarding the submittal schedule and the anticipated review duration. As described in the meeting summary, the staff does have some concerns about NuScale's schedule for submitting information to resolve key issues. Specifically, the NRC is concerned that the schedule for submitting the information is inconsistent with the time necessary for the staff to act on the information so that NuScale's desired review duration can be achieved.

As discussed below, NuScale should engage the NRC in the near-term to develop a common understanding on the priorities and schedule for the submittals. The outcome of these near-term interactions would be timely submittals that enable the staff to support NuScale's expectation for docketing the application and for conducting the review without undue delays.

- NuScale needs to prioritize the key issues to enable an effective regulatory interface.
 - For example, high priority topics that could rise to policy issues for the Commission may include fundamental NuScale design features that are not consistent with existing regulation and have little precedent for exemptions, or could have significant public interest. This includes topics such as a lack of Class 1E power, the proposed topical report on Risk-Informed Decisionmaking, or control room staffing. Such topics should be addressed early to ensure new and significant issues are identified and addressed early to support future schedule stability.

- In addition, other long lead time topics that may be less likely to have policy implications but raise significant technical issues such as core design, the use of new or revised codes, or accident safety analysis issues should also be factored in the prioritization scheme for early engagement.
- Another tier of prioritization may be complex topical reports that are less innovative in nature but can advance the maturity of the project by early submittal.

The purpose of establishing a mutually agreed upon prioritization of work is to focus attention on the important topics early, and to ensure all issues are addressed from a safety and schedule perspective while employing resources for both parties efficiently and effectively.

- Coupled with the prioritization of work, NuScale needs to be specific in the request for an NRC position on issues. NRC positions are promulgated by the Commission on policy topics, while significant technical issues are addressed at the office level and issues of lower significance are addressed by the technical staff. As part of identifying the prioritization of topics discussed above, NuScale needs to identify the method and formality of NRC feedback that is desired considering the innovative NuScale fundamental design and the timeliness of the desired response. Some examples of NRC perspectives are described below.
 - Policy topics require Commission engagement and take time to achieve resolution. These types of issues should be addressed expeditiously so that the NRC can make a decision as to whether a policy decision is needed.
 - At another level, significant design topics may warrant formal NRC approval of a topical report via a safety evaluation. However, review of topical reports, because of their complexity, can take enough time such that they could challenge the overall schedule. Thus, it is important that NuScale and the NRC reach a common understanding on the process and timing for addressing the challenging issues.
 - Meetings are valuable to exchange information, to discuss policy issues, and to gain a better understanding of the overall plant design, methodologies, and system operation. Meetings can be used to provide feedback on what is expected in the application and to clarify existing regulations. Pre-application audits of NuScale information are also useful to provide feedback on the content of the application. However, meetings and pre-application audits do not have the formality to provide official NRC positions. Policy decisions by the Commission do provide NRC positions; a topical report also provides the opportunity for NRC approval of technical information via a safety analysis report.

NuScale needs to be clear on those issues and topics for which NuScale desires an official NRC position, a topical report approval, or feedback to inform development of the application, as well as the process that will be used to request that response.

D. Atkinson

-3-

NuScale should work expeditiously with the NRC to establish the schedule for submitting information to the NRC based on established priorities. NuScale must be clear with respect to the type of response and the response time desired for resolving all the safety issues presented during the meeting on April 21, 2015. While the NRC's primary role in licensing reviews is focused on safety, early resolution of the key issues will allow a schedule to be developed to support NuScale's expectations of docketing the design certification application.

Should you have any questions, please contact Mr. Greg Cranston, Senior Project Manager for the NuScale design certification at (301) 415-0546 or via email at gregory.cranston@nrc.gov.

Sincerely,

Michael E. Mayfield, Director **/RA/**
Division of Advanced Reactors
and Rulemaking
Office of New Reactors

Project No.: PROJ0769

Enclosure:
Summary of April 21, 2015, Public Meeting
To Discuss NuScale Design Certification
Application Submittal Preparations

cc: DC NuScale Power LLC Listserv

D. Atkinson

-3-

NuScale should work expeditiously with the NRC to establish the schedule for submitting information to the NRC based on established priorities. NuScale must be clear with respect to the type of response and the response time desired for resolving all the safety issues presented during the meeting on April 21, 2015. While the NRC's primary role in licensing reviews is focused on safety, early resolution of the key issues will allow a schedule to be developed to support NuScale's expectations of docketing the design certification application.

Should you have any questions, please contact Mr. Greg Cranston, Senior Project Manager for the NuScale design certification at (301) 415-0546 or via email at gregory.cranston@nrc.gov.

Sincerely,

Michael E. Mayfield, Director /RA/
Division of Advanced Reactors
and Rulemaking
Office of New Reactors

Project No.: PROJ0769

Enclosure:
Summary of April 21, 2015, Public Meeting
To Discuss NuScale Design Certification
Application Submittal Preparations

cc: DC NuScale Power LLC Listserv

DISTRIBUTION:

PUBLIC
SBurnell, OPA

ADAMS ACCESSION No.: ML15146A088 Pkg

NRO-002

OFFICE	PM:NRO/DARR/SMRLB	LA:NRO/DARR/SMRLB	BC:NRO/DARR/SMRLB
NAME	GCranston	ARedden	MTonacci
DATE	05/26/2015	05/27/2015	05/26/2015
OFFICE	DD:NRO/DARR	D:NRO/DARR	
NAME	DJackson	MMayfield	
DATE	06/4/2015	06/5/2015	

OFFICIAL RECORD COPY