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## NUCLEAR REGULATORY COMMISSION

Title:	Public Scoping Meeting to Discuss the Review and Potential Update of NUREG-1437, Generic Environmental Impact Statement for License Renewal of Nuclear Plants – Final Report (LR GEIS)	
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PUBLIC SCOPING MEETING TO DISCUSS THE REVIEW AND

POTENTIAL UPDATE OF NUREG-1437,

GENERIC ENVIRONMENTAL IMPACT STATEMENT FOR LICENSE RENEWAL OF NUCLEAR PLANTS - FINAL REPORT (LR GEIS)

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WEDNESDAY

AUGUST 19, 2020

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The Scoping Meeting was convened via video

teleconference, at 1:30 p.m. EDT, Lance Rakovan, Facilitator, presiding.

PRESENT

LANCE RAKOVAN, Facilitator

JENNIFER DAVIS, Project Manager, NMSS

ROBERT ELLIOTT, Branch Chief, NMSS

KEVIN FOLK

KELLEE JAMERSON

NANCY MARTINEZ

JEFFREY RIKHOFF

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P-R-O-C-E-E-D-I-N-G-S

1:36 p.m.

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MR. RAKOVAN: Hello, everyone. My name is Lance Rakovan. I'm a Project Manager at the U.S. Nuclear Regulatory Commission, or NRC, as you'll hear it referred to as today. And it's my pleasure to facilitate today's meeting. I'm going to do my best to make this meeting worthwhile for everyone and hopefully you'll help us out with that.

The purpose of our meeting today is to provide you with an opportunity to give us your comments on the review and possible update of the Generic Environmental Impact Statement for License Renewal of Nuclear Power Plants, or NUREG-1437. For those of you not familiar with the term Generic Environmental Impact Statement, you'll hear it referred to as G-E-I-S, or GEIS, today.

Today's public scoping meeting is just one way that you can participate in this commenting process and you'll be hearing more about the various ways you can participate soon.

Today's meeting wi<u>llth</u> have essentially two parts. First, we'll hear a presentation from NRC staff on the topics at hand, information we think is

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important to you to understand. You can find the link to the slides that we're using from the information page for this meeting on the NRC's website.

Nancy, if you could, at some point, if you could put a link to that page or directly to the slides in the chat for folks, that would be great, thank you.

We're going to try to keep the presentation short, so we can get to the real reason we're conducting this meeting, which is to listen to you.

Once we get to that part of the meeting, if you'd like to make a comment, there's two ways you can do it. You can either send it in using the chat feature of the Webex meeting. If you do so, please choose to send it to all attendees.

Or, if you would like to make your comment verbally, you can let the operator know and he'll go into detail as to how to do that. And Daniel will start a queue and we'll go back and forth from the chats and the phone line and make sure that we get everyone's comments.

We are transcribing today's meeting, so to make sure that we fully capture your comments, you can help us make sure that we know who's speaking by identifying yourself and any group that you're with when you do speak.

You can also make sure that if you're going to speak and provide your audio comments that you minimize background noise, so that, again, we can get a clean transcript.

One item that I'm hoping you can fill out is our Public Meeting Feedback Form. You can link to this form from, again, the page for this meeting, where you can find the slides, and you can fill it out online. Your opinion on how this meeting went and how we can improve our public meetings is very valuable to us, so if you have a moment and can take time to do that, we very much appreciate it.

I'd like to take a moment to introduce some of the NRC staff that is on with us today.

Jennifer Davis, who will be giving our presentation, is the Project Manager for this GEIS. She has 18 years of environmental project management experience, including various licensing projects, such as Project Manager of the previous review of the GEIS. Jeff Rikhoff is a Senior Environmental

Scientist and is the Technical Issues Lead on this

review of the GEIS. Jeff has many years of experience in conducting environmental reviews for the NRC and other federal agencies, including as Technical Lead for the previous 10-year review and update of the GEIS.

Robert Elliott is the Chief of the Environmental Review License Renewal Branch in the NRC's Office of Nuclear Material Safety and Safeguards.

And Kevin Folk is a Lead Environmental Technic<u>alian</u> Reviewer for the GEIS. He's an environmental scientist with over 25 years of experience in environmental impact assessments, including, like others, working on the previous GEIS review.

With that, I'm going to go ahead and I'm going to hand things over to Jennifer Davis, who is going to give our presentation. Again, you can find a link to the slides on the page, and it looks like Nancy has put that up there, thank you.

Jen's going to go through the slides. And then, we'll go ahead and move on to the next phase of our meeting. So, please, Jen, if you would go ahead? MS. DAVIS: Thank you, Lance. First off,

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we want to thank everyone for participating today. We appreciate you taking time out of your busy schedule to meet with us and provide us with your comments.

Again, my name is Jennifer Davis. I'm the Project Manager for the Generic Environmental Impact Statement for License Renewal of Nuclear Plants, or GEIS, as we call it. And I'm here today to explain how the NRC plans to review and possibly update the GEIS.

By way of background, let me give you a little background story about the GEIS itself. As part of the license renewal program initiated in the late 1980s, the NRC undertook a comprehensive review to identify the environmental impacts that could result from the continued operation of nuclear power plants beyond the original 40-year license term.

The results of this comprehensive review were published in 1996, as the Generic Environmental Impact State<u>ment</u> for License Renewal of Nuclear Plants, also known as the GEIS.

During this comprehensive review, the Commission determined that certain environmental impacts were essentially the same or similar for all nuclear power plants and, as such, could be addressed

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generically in the GEIS.

A total of 92 license renewal environmental impact issues were identified in 1996 as a result of this review.

The primary purpose of the GEIS is to identify all environmental effects of license renewal and evaluate those environmental impacts considered to be generic or common to all nuclear power plants. The GEIS also determined issues that need to be addressed in nuclear plant site-specific environmental reviews, which are produced in supplements to the GEIS.

The results of the comprehensive review are summarized as findings on NEPA issues for license renewal of nuclear plants in Table B-1 of NRC regulations at 10 CFR Part 51.

In these regulations, the Commission also indicated its intent to review and update the findings in Table B-1 and the License Renewal GEIS every ten years.

So, this meeting today is part of that process to determine whether or not the NRC should revise the GEIS and update the summary findings in Table B-1, and most importantly, to receive your comments and proposals for areas of the GEIS needing

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to be updated.

The GEIS has been a very effective tool in focusing reviews on important site-specific issues and concerns at each nuclear power plant site, thereby increasing the overall efficiency of license renewal environmental reviews.

Lessons learned and knowledge gained about environmental issues of public concern during sitespecific license renewal reviews are also considered when updating the GEIS.

Public comments are also used to help validate the existing environmental issues and identify new ones.

In revising the GEIS, the NRC staff will consider the need to modify, add to, consolidate, or delete any environmental issues evaluated in the GEIS.

As a result of the previous ten-year comprehensive review, which was completed in 2013, the NRC staff carried forward 78 of the original 92 environmental impact issues for detailed consideration in the GEIS.

The 2013 review did not eliminate any of the environmental issues evaluated in the 1996 GEIS, but certain issues were consolidated or grouped

according to similarities. Next slide, please.

The range of the environmental impact issues di<u>scussed inrecting</u> the GEIS and considered during every license renewal environmental review is wide-ranging.

This slide gives you an idea of some of the important environmental impact areas the NRC considers during each review. The GEIS discusses the license renewal impacts for each of these areas shown on this slide. Next slide, please.

As previously noted, Table B-1 in 10 CFR Part 51 summarizes the findings on environmental impact issues analyzed in the GEIS. In other words, the GEIS is the technical basis for the summary of findings in Table B-1.

As many of you may know, the issues in Table B-1 are categorized as either Category 1 or Category 2. Category 1 issues are considered generic, as the impacts have been found to be essentially the same or similar at all nuclear plants. Category 2 issues are impact issues that need to be addressed in nuclear plant site-specific environmental reviews.

Category 1 impacts are also addressed in the GEIS and are usually not evaluated in a site-

specific environmental review, unless new and significant information has been found that differs from the findings presented in the GEIS. Next slide, please.

In reviewing the GEIS, the NRC is also considering whether the summary of findings on environmental impact issues listed in Table B-1 needs to be updated, modified, or deleted.

We are considering whether new environmental impact issues need to be added and evaluated in the GEIS, including issues that were evaluated during nuclear plant site-specific environmental reviews and resulting from changes to environmental laws and regulations.

We are also considering whether to reorganize the issues in the GEIS to clarify and simply impact discussions and to streamline environmental impact analyses.

In addition, we would also review the organization and format of the GEIS. Most importantly, the review will consider the public comments we receive today, during the scoping period, as well as public comments previously received during nuclear plant site-specific license renewal reviews. Next slide, please.

This slide illustrates the process for reviewing and updating the GEIS, along with opportunities for public involvement.

The NRC issued the Notice of Intent to conduct scoping for the ten-year review on the GEIS on August 4<u>th</u>. This <u>noticestatus</u> initiated a 90-day public scoping comment period. Public comments received today and during the scoping period will aid the Commission's decision on whether or not to proceed with updating the GEIS and Rule.

At the end of the scoping period, the NRC staff will review all public comments received and determine whether to proceed with the review and update.

Should the determination be to proceed, the staff would draft a rulemaking plan for the Commission's review and approval, explaining the reasons for updating the GEIS and Rule.

If approved, the staff would begin to revise the GEIS and draft proposed rule changes. Once completed and approved by the Commission, the draft revised GEIS and the proposed Rule would be issued for public review and comment.

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The staff will collect and address all comments received during that public comment period and make any necessary revisions to the GEIS and Rule. The Commission would then review and approve the final GEIS and Rule. Next slide.

Today, we are requesting your help in identifying environmental issues and concerns needing to be evaluated and updated in the GEIS. We also welcome any proposals for changes that you feel should be made to the GEIS and in license renewal reviews. Next slide.

The NRC staff has completed its preliminary review and identified several potential areas needing to be addressed or updated in the GEIS.

The staff identified greenhouse qas emissions as an area needing to be addressed, because the Council on Environmental Quality issued proposed guidance on June 26, 2019 titled <u>"Draft National</u> Environmental Policy Act, or NEPA, Guidance on Consideration of Greenhouse Gas Emissions,'' which federal agencies explains how should address greenhouse gas emissions in NEPA analyses.

The GEIS already discusses the impacts of greenhouse gas emissions. The NRC is now considering

whether to evaluate greenhouse gas emissions as a Table B-1 NEPA issue and whether it should be a Category 1 or 2 issue and its impact level.

The next issue on this slide, Table B-1 issue that we'll be discussing is groundwater quality degradation, plants with cooling ponds in salt marshes, which affects two nuclear plants.

The NRC staff is determining whether this issue should be consolidated with groundwater quality degradation resulting from water withdrawal and expanded to consider environmental impacts of saltwater intrusion and encroachment on adjacent surface water quality.

The staff are also considering whether the existing NEPA issue in Table B-1 threatened, endangered, and protected species and essential fish habitat should be divided into separate interagency consultation requirements based on federal statutes that afford certain species or habitats special status or protections.

Some of these requirements do not apply to all nuclear power plants, for example, essential fish habitat.

The staff is also considering whether the

issue heading should be changed to federally protected species and habitats, to exclude protection categories that do not require interagency consultation or nonfederal protection categories, such as state<u>-</u> <u>listed</u>less species, as well as clarifying the meaning of the word protected.

The staff is also considering whether a finding should be added for the protection of marine resources to address requirements for interagency consultation with the National Oceanic and Atmospheric Administration under the National Marine Sanctuaries Act. Next slide.

Based on the staff's preliminary review, the staff has also determined that there is a need to clarify that the findings in the GEIS also apply to subsequent or second license renewal reviews.

Our next two areas on this slide deal with the incorporation of updated guidance.

In February 2019, the U.S. Department of Energy updated its graded approach for evaluating radiation doses to aquatic and terrestrial biota, which is the standard for evaluating the potential effects of radionuclides on biota. The NRC is considering making conforming changes based on this

new guidance in the GEIS.

The NRC staff would also like to endorse Nuclear Energy Institute guidance NEI 17-04 Revision 1, <u>``</u>Model [Subsequent License Renewal<sub>7</sub> or] SLR, New and Significant Assessment Approach for SAMA<u>''</u> in the GEIS. This guidance explains how license renewal applicants should identify and consider new and significant information with respect to prior severe accident mitigation alternatives, or SAMA, analyses.

The staff would also incorporate new information from the revised Biological Effects of Ionizing Radiation, or BEIR, VII report, which is titled <u>``</u>Health Risks from Exposure to Low Levels of Ionizing Radiation, <u>`'</u> prepared by the National Research Council Committee.

In addition, in revising the GEIS, the NRC staff would also address subsequent license renewal review situations where licensees did not use NEI Guidance <u>05-0</u>1 Revision A, the <u>"sSevere aAccident</u> <u>mMitigation aAlternatives</u>, <u>(SAMA)</u>, <u>aAnalysis gG</u>uidance <u>dDocument''</u> during the previous reviews.

And finally on this slide, the NRC staff has also determined that there is a need to better explain the meaning and purpose of new and significant

information in the GEIS for clarity and consistency in plant site-specific license nuclear renewal environmental reviews. Next slide, please.

Currently, NRC regulations limit the findings in Table B-1 to only those nuclear plants licensed to be constructed and operated prior to June 30, 1995. Vogtle Units 3 and 4 are nearing completion and the owner-licensee could, in the future, consider applying for license renewal.

The NRC staff is considering whether to revise the GEIS to address large light water reactor plants permitted for construction nuclear and operation after June 30, 1995.

The NRC is also considering the future utility of the GEIS. For example, including advanced or small modular reactors, because, in future, a licensee could apply for renewal. The staff is currently considering whether to include license renewal for these facilities in the GEIS.

And finally, the staff is considering the environmental impacts of license renewal beyond the 20-year license renewal term.

The Atomic Energy Act of 1954, as amended, allows the NRC to grant nuclear power plant operating

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licenses for up to 40 years. NRC regulations allow for the renewal of operating reactor licenses for up to an additional 20 years beyond the current licensing period.

The staff is in the early stages of evaluating whether to extend operating reactor license renewal periods from 20 years to a maximum of 40. So, should the impact analysis in the GEIS consider the environmental impacts of license renewal beyond the current regulatory limit of 20 years, up to a maximum of 40 years?

This briefly summarizes the results of our preliminary review of the GEIS and the NRC is inviting you to comment on the results of our review and is requesting proposals for other areas of the GEIS that should be updated.

It is also important to note that the NRC is reviewing the Council on Environmental Quality's Julv 16, 2020 final rule, which updates the **``<del>r</del>Regulations** *i*Implementing the **p**Procedural <u>pP</u>rovisions of the National Environmental Policy Act, '' to determine its effect on the GEIS. Next slide.

There are multiple ways to comment on the

NRC's review. You only need to submit comments by one of the methods listed here on this slide.

You can email your comments directly to our project email address, LicenseRenewal-GEIS@nrc.gov.

You can also submit comments through regulations.gov by searching for Docket ID NRC-2020-017515.

Written comments may also be submitted by mail to the NRC's Office of Administration, at the address indicated on this slide. If you choose to submit written comments, we do ask that you specifically state that you're commenting on the License Renewal GEIS and reference the appropriate docket number in your correspondence. That makes it easier for our administrative staff to route your comments to us in a timely fashion.

Please note that due to COVID-19, providing comments via our project email address or through regulations.gov are the preferred methods as there are currently limited staff in the NRC building at this time.

> MR. RAKOVAN: Hey, Jen, this is Lance. MS. DAVIS: We would also like --

MR. RAKOVAN: I'm sorry to interrupt, but I think we got a slide ahead. If we could bring the slide on how to comment back up and leave it up there just for a -- there we go, okay -- and leave it up just --

MS. DAVIS: No problem.

MR. RAKOVAN: -- for a short time, just so folks can see it. I just wanted to make sure, because you're going through the details, but I think we were a slide ahead.

MS. DAVIS: Well, I can go back and recap if you like, Lance, that's fine.

So, again, we have several ways in which you can comment on this. You can provide your comments directly to our project email address.

You can submit comments to regulations.gov, again, make sure you search under the appropriate Docket ID number, which in this case is NRC-2020-0175.

And then, of course, written comments may also be <u>sent</u> through the U.S. Mail to the NRC's Office of Administration at the address provided on the slide. Just a reminder, if you are going to use this method to make sure that you specifically state that

you're commenting on NUREG-1437, the License Renewal GEIS, and reference the appropriate Docket ID in your correspondence.

And again, just to reiterate, owing to COVID-19, we have very limited staff in the building to process these, so the preferred methods for submitting public comments are going to be through our project email address or through regulations.gov.

One thing we do want to remind you is, as you provide comments, these will not be edited to remove any personal identifying or contact information, so do not include any information in the comments that you do not want publicly disclosed.

And finally, you can provide comments at today's meeting. As Lance mentioned earlier, we do have a court reporter here with us today to help record all comments that we receive today. Next slide.

As a reminder, the deadline for submitting comments is November 2, 2020. At the conclusion of scoping, the NRC will review all public comments and proposals to determine whether to proceed with the update.

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If the NRC determines that an update is

not necessary, a <u>Nn</u>otice of <u>this</u><u>Dd</u>ecision will be published in the Federal Register. Next slide, please.

This slide provides contact information, in case you have any questions or you need to reach out to NRC staff to discuss any concerns you may have about the GEIS review. Again, all comments received during scoping will be considered. And with that, I'll turn the meeting back over to Lance. Thank you.

MR. RAKOVAN: All right. Thank you, Jen. Before we move fully into the commenting portion of our meeting, I'd like to take a moment just to see if anyone has any clarifying questions to the material that Jen covered.

Again, you can put it into the chat feature. If you would, please send it to everyone, so that everyone can see it.

And, Daniel, if you'll go ahead and let folks know how they can get your attention to start a queue. And again, we're just looking for clarifying questions for Jen's presentation. Daniel, please?

OPERATOR: Certainly. If you would like to ask a question, you can press Star and then 1. Remember to unmute your phone and record your name

MR. RAKOVAN: All right. We'll pause for a moment to see if anybody has any clarifying

ask a question, Star, then 1.

questions.

OPERATOR: Nothing has come in on this end so far.

MR. RAKOVAN: All right. I'm not seeing anything on the chat as well. And again, it's okay to ask clarifying questions as we go ahead and move into the commenting portion as well, this is not a speak now or forever hold your peace kind of thing.

But why don't we go ahead and do that, let's go ahead and open the floor again. A very important part of this process is making sure that we hear from the public.

So, if you have any comments that you would like us to consider as we move forward with this initiative, again, Daniel will go through how, you can let folks know how to start a queue on the phone lines.

If you would like to send something through the chat, just type it up. And again, share

it to everyone.

OPERATOR: As a reminder, if you would like to ask a question, please press Star, then 1. Remember to unmute your device and record your name clearly when prompted. If you would like to withdraw your question, you can press Star and then 2.

Again, if you would like to ask a question, please press Star, then 1. One moment as we wait for our first question.

MR. RAKOVAN: Okay. We do have a question that came in from the chat. Is there a forecast timeline for issuance of a revision to the GEIS, NUREG-1437?

MS. DAVIS: Well -- this is Jennifer Davis. Currently, we are in the scoping period, which is 90 days. It concludes on November 2, as I said earlier. What we will do is take the information received from the scoping process and determine whether or not to proceed.

If we do decide to proceed, we will develop a rulemaking plan, which we will submit to the Commission. And once we submit it to the Commission, our goal is kind of end of this year, early next year.

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If we get Commission approval, we have one

year from that date of the Commission order to issue the draft GEIS and the proposed Rule.

MR. RAKOVAN: Okay. Daniel, do we have anybody wishing some time from the phone line?

OPERATOR: Nothing has come through yet. As a reminder, you can press Star and then 1 to ask your question. Nothing on this end still.

MR. RAKOVAN: All right. We have nothing on the phone lines and I don't see anything on the chat. So, we might have a quiet group. Let's go ahead and then pause, just to give folks a little bit of time, though, don't want to rush this.

All right. We're going to hold steady with a little bit of dead time for about a minute, want to make sure we give folks a chance.

All right. We've got something from the chat. From the presentation, it appears this update is focused on relicensing operating plants. Will any of the GEIS updates apply to decommissioning plants? Jen, are you there?

MS. DAVIS: Oops, yes, I am, sorry, it was on mute.

MR. RAKOVAN: Ah, got you, okay.

MS. DAVIS: Yes. The license renewal of

nuclear -- the Generic Environmental Impact Statement for License Renewal of Nuclear Plants is focused on reactor license renewal.

We do talk about termination of operations and decommissioning within the GEIS, however, decommissioning itself is covered by another Generic Environmental Impact Statement.

Jeff, would you care to add anything else to that?

MR. RIKHOFF: No, that's true. We do have the issue in Table B-1 and in the GEIS where we do discuss the effects of terminating reactor operations. But we do not -- it does not include plants that are already in decommissioning, just want to make that point clear. That's all.

MR. RAKOVAN: Okay. Any other questions or comments that folks have? Again, you can send it in to everyone on the chat or you can signal Daniel, who will open the phone line for you.

OPERATOR: As a reminder, if you do want to use the phone line for your question, you can press Star and then 1 on your device to prompt for your question.

MR. RAKOVAN: All right. Daniel, one last

check to see if we have anyone on the phone line?

OPERATOR: No questions at this time.

MR. RAKOVAN: Okay. I don't see anything on the chat as well. So, Jen, do you want to go ahead and move forward?

MS. DAVIS: Yes. So, what we can do is, Kellee, if we could go back to the slide discussing on various ways to comment?

Again, we do want to thank everyone for attending and participating in our meeting today. We really appreciate you taking the time to meet with us and provide us with your questions and comments.

In addition to this meeting, we have three more public webinars. The next meeting will start later this evening, at 6:30 p.m. Eastern Standard Time. And we also have two more sessions scheduled for the same time on August 27.

Just as a reminder, the scoping period does end on November 2, 2020. And just remember, you only need to submit comments by one of the methods listed on Slide 12. Again, that's through our project email, through licenserenewal-GEIS@nrc.gov. Through regulations.gov.

Just be sure that when you submit your

comments, that you are commenting on the License Renewal GEIS and you cite the appropriate reference Docket ID in your correspondence.

Again, if you have any other questions, please feel free to reach out to myself or Jeffrey Rikhoff at the contact information listed on the final slide. Thank you.

MR. RAKOVAN: All right. With that, I believe we are closed. Thank you, everyone.

(Whereupon, the above-entitled matter went off the record at 2:09 p.m.)