

UNITED STATES OF AMERICA
NUCLEAR REGULATORY COMMISSION

BRIEFING ON MILLSTONE AND MAINE YANKEE

LESSONS LEARNED

PUBLIC MEETING

Nuclear Regulatory Commission
Commission Hearing Room
11555 Rockville Pike
Rockville, Maryland

Wednesday, February 19, 1997

The Commission met in open session, pursuant to notice, at 2:04 p.m., the Honorable SHIRLEY A. JACKSON, Chairman of the Commission, presiding.

COMMISSIONERS PRESENT:

- SHIRLEY A. JACKSON, Chairman of the Commission
- KENNETH C. ROGERS, Member of the Commission
- GRETA J. DICUS, Member of the Commission
- EDWARD McGAFFIGAN, JR., Member of the Commission
- NILS J. DIAZ, Member of the Commission

STAFF AND PRESENTERS SEATED AT THE COMMISSION TABLE:

- JOHN C. HOYLE, Secretary of the Commission
- KAREN D. CYR, General Counsel
- HUGH THOMPSON, Acting EDO
- FRANK GILLESPIE, Director, Inspection & Support Program, NRR
- STEVE STEIN, Senior Technical Assistant, NRR
- FRANK MIRAGLIA, Director, NRR
- BILL BORCHARDT, Chief, Inspection Program Branch, NRR

P R O C E E D I N G S

[2:04 p.m.]

CHAIRMAN JACKSON: Good afternoon, ladies and gentlemen. The purpose of this meeting is for the Commission to be briefed by the NRC staff on the status of recent Lessons Learned activities and to explore the Staff's recommended approach to address key policy issues that have been identified.

In November of 1995, I requested that the Staff perform a Millstone Lessons Learned review to improve existing oversight processes, that is, reactor oversight processes, and/or to develop new processes to aid in earlier recognition of deficient conditions or trends at all of our powerplant licensees.

This review, although titled a Millstone Lessons Learned, has been supplemented by information from several other recent NRC inspections.

Additionally, I believe an honest assessment from the NRC would indicate that several of these areas are overdue for improvement, particularly the use and

maintenance of the final safety analysis report and the implementation of 10 CFR 50.59, changes, tests, and experiments.

The Commission was provided with the Lessons Learned Part 1 report in September of last year. Recently,

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the Staff provided the Commission with two additional reports, the Lessons Learned Part 2 report, which will be discussed and is publicly available today, and a paper on the implementation of 10 CFR 50.59, which, although closely related, will be the subject of a future Commission meeting, tentatively scheduled for March 10, 1997.

The Commission is very interested in the policy questions being presented in today's briefing regarding the important areas of licensing basis, design bases, and the final safety analysis report.

The Commission is interested in how we got to where we are, but is much more interested in ensuring that there is a timely plan for integrated fixes to the processes that are based on either ensuring compliance with existing regulations or providing improvements with a net safety benefit, dually considering costs.

The Commission understands that there will be considerable industry interest in these topics and is interested in the Staff's plan on interaction with the industry and the public regarding the various topics to be discussed today.

Now, I understand that copies of your presentation are available at the entrances to the meeting, and so, unless my fellow Commissioners have any additional comments, please start. Mr. Thompson?

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MR. THOMPSON: Thank you, Chairman, Commissioners. With me at the table this afternoon are Frank Miraglia, who is the acting director of NRR, and Bill Borchardt, who is the chief of the Inspections and Support Branch. To my left is Frank Gillespie, who is the director of the Inspection and Support Program in NRR, and Steve Stein, who you may recall headed up the Millstone Lessons Learned Task Force.

Today's briefing focuses on the results of the Staff's evaluation of four of the six issues discussed in the Millstone Lessons Learned Report Part 1, which was forwarded to the Commission in September of '96.

Chairman Jackson, as you said, this is an issue that we did in response to your directions, and in fact, it turns out to be a very comprehensive effort and one that really does take very careful integration of our responses into these, and obviously, it is an important element in improving the Staff's performance with respect to oversight of operating reactors.

The Part 2 report offers a number of recommended short-term and long-term actions related to regulatory oversight and improvements in the areas of the design basis, the current licensing basis, and the content and use of the safety analysis report. The recommendations include changes to regulatory guidance and studies to determine the need for

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rulemaking.

Now I would like to turn the briefing over to Frank Miraglia who will begin the formal presentation.

MR. MIRAGLIA: Madam Chairman, Commissioners.

CHAIRMAN JACKSON: Good afternoon.

MR. MIRAGLIA: Can I have the first slide, please?

This first slide has the questions that were raised in the Part 1 report, Lessons Learned, that was made available to the Commission and to the public in September of 1996. Each of these questions have policy considerations and policy issues that we would like to discuss with the Commission today, those issues involving licensing basis and current licensing basis, design basis and design basis documentation, FSAR, updates and commitment, and related issues of 50.59.

The last two questions deal primarily with the 50.59 process. The fourth question also has a nexus and an overlap to the 50.59 paper, and as you mentioned, Madam Chairman, that briefing is scheduled tentatively for March 10th, and those areas will be considered in a little more detail at that briefing.

Each of these issues and policy questions have been examined by the agency as single issues over probably the past decade. In the backup Vugraphs on pages 14 to 15, there is a chronology. I just direct your attention to that .
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briefly.

FSAR considerations and 10 CFR 50.71(e) was considered back in 1980. There were internal consideration and documentation of commitments in '81 and '85. Certainly, the '90 to '95 time period was a very, very active period in terms of design basis, documentation and review, and interaction with the industry and the Commission, and the license renewal rule and the development of that rule brought a lot of licensing basis and current licensing basis issues before the agency's consideration.

As I have said, these issues have been looked at and considered singularly by the agency over a period of time, and in the context of this Lessons Learned, it has certainly pointed the vulnerabilities in the process, areas for improvement that the Chairman mentioned that said perhaps some of these issues need to be reexamined in light of the vulnerabilities that have been identified by the lessons learned conducted to date.

As Mr. Thompson said, we have some short-term actions that we propose as well as some long-term. The short-term actions are some of which have been taken and are underway, don't involve policy questions. Some, we will have to come back to the Commission for a further review and comment, and those short-term actions are aimed at addressing these vulnerabilities. Closing the windows of .
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vulnerabilities, I addressed, perhaps, not completely, but slightly. We are gaining information by which we can further access the significance of cost benefit considerations of further long-term actions, perhaps as much as going to rulemaking in some areas.

The report that you will hear from Mr. Gillespie will go over several of these major areas to discuss the issue and problem, the short-term corrective actions, and then the longer-term corrective actions.

As Mr. Thompson indicated to you in a memo that forwarded both of these papers, there is a nexus between these issues and the 50.59. The 50.59 is more process-oriented and could move perhaps in parallel, but it has to be closely coupled, and we'd like to integrate our actions and get back to the Commission subsequent to some initial feedback from the Commission on the issues raised here and in the 50.59 process.

If there are no questions for me, I would like to turn it over to Mr. Gillespie.

MR. GILLESPIE: Slide 2 just gives some background, Chairman Jackson, which you already really outlined. So let me go, then, immediately to Slide 3, the difference between the first report and the second report.

The first report was organized along functional lines to be able to ask questions about licensing inspection enforcement, licensing reporting, management oversight, and license renewal.

What we have extracted from that for Lessons Learned 2 is those policy questions where we really needed involvement, direction or guidance from the Commission, and which crosscut the areas, so that the question of licensing basis, design basis, and FSAR and decisions made there will, in fact, then have an effect on licensing inspection enforcement. So it is written in a different format.

There are a number of actions already undertaken, and in response to recommendations from the first report, I have included some samples of those as backup slide 18 and 19. I am not going to propose that I go through them, but I will be happy to answer questions. Some of them are part of the short-term actions which are already done, and they were previously supplied. Many of these were previously supplied to the Commission in our project's performance improvement plan document, which was, I think, a very large table that came up probably around 10 or 12 pages long, with a lot of individual items that are being worked on.

Looking at the policy questions that came out of Part 1 and to be addressed, 50.59 is being addressed, as was said, separately. So we will go into Slide 4.

The objectives of the Part 2 report were, one, a management review of the Part 1 report to come down to the

key policy question which crosscut all of those functional areas which is how the Part 1 report was organized, identification and discussion of the policy issues, trying to get at the root cause of the problem, as was seen, some possible actions and approaches. In doing that, the major policy issues that came out dealt with the licensing basis, design basis, FSAR questions, and these are all closely linked because, by our regulations, a design basis is part of the FSAR, and both the design basis and FSAR are part of the licensing basis. So they are very closely interlinked.

The Vugraphs actually get kind of repetitive when we get through them on short- and long-term actions because, when you have set it for one, it shows up, again, on the next several.

CHAIRMAN JACKSON: Let me ask a question. Does that involve your getting comments from the regions as well?

MR. GILLESPIE: Absolutely.

CHAIRMAN JACKSON: Okay.

MR. GILLESPIE: This went through extensive comment --

CHAIRMAN JACKSON: And all the technical branches?

MR. GILLESPIE: From all of the technical branches, all the divisions, extensive rounds of comments, and incorporating comments and recommending on those comments. It was a massive consensus development process.

CHAIRMAN JACKSON: Okay.

MR. GILLESPIE: Just by background, and quickly, the current regulatory process, as currently practiced, not

making a claim to its absolute correctness or anything, is that the licensing basis is contained in a variety of documents, answers to generic letters, answers to notices of violation, responses to calls, requests for additional information, safety evaluation reports that accompany technical specifications. A variety of documents would be considered in the licensing basis, if I apply the licensing basis definition as given in Part 54, and that is a recognition that the licensing basis is not defined in Part 50 and, in fact, the term is only used once, and that is in our authority to issue a 50.54(f) letter to say how do you comply with your licensing basis. Yet, it is left undefined in Part 50, and that will come up later in one of our longer-term recommendations.

It is unique for each plant. The SER that supports the amendment, the amendment is unique for each plant. The answers to generic letters tends to be unique. So it is in a unique information form, but on the docket file and in the public record.

It is continually evolving or growing because we continue to correspond with licensees that continue to answer letters of inspection reports, items of

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noncompliance. So this is an ongoing process. It didn't stop just for us to look at it. So this is just a thought that it is there.

Current licensing basis, again, I said it's used once, and we used the Part 54 definition to baseline ourselves here.

Design basis is defined --

CHAIRMAN JACKSON: It's used in Part 50 without ever having been defined in Part 50?

MR. MIRAGLIA: Just a phrase.

MR. GILLESPIE: Just the phrase "current licensing basis," yes.

MR. MIRAGLIA: Yes.

MR. GILLESPIE: Design basis is defined in Part 50. It is also presented in the FSAR as to be in 50.34(b) that the design basis is to be included in the FSAR. So the relationship is fixed in our regulations.

We do recognize that there is important information. It is not necessarily in the FSAR, which could be considered design basis information, and this would be material that potentially -- and if I could use maybe the Maine Yankee example, the items over in the SER that were conditions on the use of a code, the conditions did not find their way into the FSAR. Yet, those conditions could have been viewed as a design restriction on the use of the code . 13
in design work.

Policy statements for supporting information. In 1992, there was a Commission policy statement on design basis, design basis reconstitution, and in that policy statement, the Commission was very careful in their use of terminology of design basis and design documentation, and in fact, it is very consistent with the regulations, the definition of design basis, and then it refers to the policy statement to design documentation, which is even another layer of supporting information.

FSARs. The FSAR is initially part of the license, that initial licensing. It does present the design basis. By regulation, that relationship is established. It is unique to each plant in a temporal sense, as well as in a

design sense. There is a uniqueness plant-to-plant based on their design and the basic engineering, but there is also a significant uniqueness based on when in the history of the agency that a particular plant was licensed, and this was also evolving, but we'll find in -- I think everyone is familiar with the anecdotal information about the one-volume FSAR at the early sights, licensed in the late '60s or early '70s, and I think it's the 31 Volume FSAR that belongs to Comanche Peak.

So a big span -- that is what I mean, a temporal nature. So the level of the detail was affected by time,

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but they are all controlled by updates required by 50.71(e).

CHAIRMAN JACKSON: Let me ask you this question. What's the relationship between the FSAR that is part of the license application, the 50.34 FSAR, and the updated FSAR, and what regulatory function does the updated FSAR serve relative to --

MR. MIRAGLIA: The FSAR is the initial documentation, and 50.71(e) provides for updating that to reflect modifications and changes. So it would be the starting point for each of the documents.

CHAIRMAN JACKSON: Okay. And which one serves the regulatory function in terms of any current regulatory action we would have with licensees?

MR. MIRAGLIA: It would be the updated, plus any changes that they had made since the last update that would impact on that information.

CHAIRMAN JACKSON: Okay.

MR. GILLESPIE: In fact, the relationship between the original FSAR and the updated FSAR, 50.71(e), is actually spelled out in the regulation where it refers to the FSAR originally submitted is part of the application for operating licenses. So that relationship is fixed, so that the updated FSAR is, indeed, the operable document today.

And 50.71(e) -- and I'm going to cover this also later -- has really two parts. It has a reporting

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requirement and it also has words in it that talk to the substance of what should be reported, and those are two very unique and important pieces.

Going on to the licensing basis, starting from the most broad terminology that we have, the identified problems with the licensing basis where some practices of some licensees differ from the licensing basis -- and this is a statement which reflects both good and bad. It's not necessarily bad that they're not doing it. They might have changed it. They might have done it a different way, but it's just different than those documents which may, in fact, be on the docket file.

On the other side, they might be -- they might have stopped doing something we really wanted and continue to do, but it's different. So the root problem here was that it was different.

They have difficulty in identifying or locating some licensing basis information. I mean, even ourselves, when you go in and try to manually go through and mind the docket file, it is a very tedious, tedious effort, and to do it in a complete manner for any given system is extremely difficult, but we could do it.

CHAIRMAN JACKSON: Let me ask you a couple of questions on these points. On page 7 of the report that you actually sent, there is a statement that the NRC and the

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industry, however, did not implement -- or fully, I guess, implement the FSAR update rule. Would you elaborate a little on that and say how that came about?

MR. MIRAGLIA: We are going to cover that later.

CHAIRMAN JACKSON: You are?

MR. MIRAGLIA: Yes. It is in the presentation later, and we will talk to that.

CHAIRMAN JACKSON: All right, okay.

Well, then, let me ask a question on your current page 7 of the Vugraph. If some of the licensees -- or there's been difficulty identifying or locating some licensing bases or some have not been incorporated into plant procedures, how have we been able to adapt in terms of our inspection program to these variabilities that have come about as a consequence of this?

I mean, how have we handled that from the point of view of inspection if one can't identify the licensing basis or locate it or it is not incorporated in the plant procedures? What do our inspectors, then, inspect against?

MR. MIRAGLIA: The inspectors will go out and they will go and look, and more recently, I guess it was last March -- February or March where we put the guidance out -- to specifically start with the FSAR.

Some of the difficulties in identified issues with respect to the differences and practices and such have been . 17 reported to the Commission in terms of the spent fuel cooling FSAR survey and the first four months of the FSAR inspections, but we get at it by the FSAR and by some of the inspections that get into information design and by pushing to say what is the licensing basis, and most places come up with the information. The difficulty is having it readily accessible.

If you go back to the Commission's policy statement on accessibility, it talks in terms that it should be readily accessible, and I think there's a variability out there with the licensees.

Certainly, we don't have ready access to all of the information because it's in a multitude of databases, essentially maintained by the licensees. We depend upon the licensees' systems, in large measure, and use what we have in our independent knowledge going in on that area as to what we understand the basis, and we root around in that.

One of the issues that we talked about in the last week or so at Maine Yankee was the off-site power and the electrical lines and what was the licensing basis. It wasn't clear. We kept asking questions, and looking at questions, we came to a resolution what the licensing basis was. So we can get at it, but it's not always easy or readily accessible, and I think that's what Frank was alluding to in the comments here.

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CHAIRMAN JACKSON: So, I mean, is the statement, then, that it, in fact, does have or has had some effect, then, relative to our inspection function? Because if it's not readily available or you have to root around, then you don't have it readily available to use.

MR. MIRAGLIA: In terms of our inspections, they are audit-type functions. We look in those areas that we are auditing. The licensee has the responsibility for --

CHAIRMAN JACKSON: No, I understand that, but I'm just saying if it's not there, even where we look, then it's not there where we look. Okay. I think you are going to

deal with some of this.

MR. THOMPSON: And I think as we progress, there were some times we had commitments in subsequent licensings that earlier plants may not have had in their licensing basis or their tech specs.

So, as we said earlier, in the temporal nature of the licensings, we were able to inspect at a different level of detail to different licensees, but obviously, the operating tech specs is kind of like the fundamental thing that we start and always make sure the licensees follow the tech specs.

As you get further and away from the operating tech specs and more into the details of the FSAR and the other licensing basis, the more you have to dig down into
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what you are really looking for.

CHAIRMAN JACKSON: Except that I recall when there were these original inspections and studies done, there were some instances where there were things in the FSAR -- I'm not saying it was widespread, but there were at least a couple where there was essentially a conflict between what was in the FSAR and what was in the tech specs, and the one seemed to speak against the other. So there was, in fact, A, areas where they overlapped, and, B, where they were inconsistent.

MR. MIRAGLIA: And what we found in those areas -- Bill, you can help me with some of the statistics -- there was a number of discrepancies found. Very few resulted in noncompliance or escalated enforcement. Some were as simple as the documentation in one area was updated and the other wasn't. So you have to go in and look and evaluate.

One of the areas where the vulnerability is broad is in the design area because we don't -- as we have talked, our operational focus has been -- I mean, it has been on operations. So we don't probe into design area, and to get into those areas, and an operational focus, we're looking basically from the broad performance base or the procedures doing the job or the tests showing that the equipment works, and that vulnerability has been discussed with the Commission in the context of our areas of design, and that's
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where the design basis and licensing basis becomes harder to root out. You have to really look and dig in certain kinds of areas.

I think some of the special inspections that -- Millstone had demonstrated that. The ISI, the Maine Yankee, the ISA, ISI.

CHAIRMAN JACKSON: No, I agree with you, and I'm not disagreeing with anything you have said.

MR. MIRAGLIA: I just want to give the right kind of context.

CHAIRMAN JACKSON: Right, but let me give you my context, and that is, we have done these focused special inspections, and they've told us certain things, and in some ways, they've given us more comfort, and in some others, they've shown some vulnerabilities.

It is very difficult at a certain level, though, if we talk about the variability in the FSARs to start with and then we talk about difficulty in identifying and locating design basis information or it hasn't been incorporated into plant procedures. You can't give an unequivocal statement in the absence of some particular focus look that you have actually been able to satisfy or could satisfy the public or perhaps the Commission or

yourselves that you know, I mean, in spite of what you say about tech specs that everything that has any safety

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significance, you know, we know about, and I think that's the vulnerability we are trying --

MR. MIRAGLIA: And I think that is fair. I think what we are talking about is putting actions in place to get a better dimensioning of those issues and concerns, how many of them in safety were significant and what measures and next steps we should take.

CHAIRMAN JACKSON: Right.

MR. MIRAGLIA: And I think that goes to some of the short-term actions and long-term actions.

CHAIRMAN JACKSON: Okay.

MR. GILLESPIE: Overall, in the licensing basis area, we included in the report, and I'm going to repeat it here, what we're intending to try to get at, and that's to provide increased assurance that licensees know and are complying with their licensing basis without imposing undue regulatory burden, and the burden I am talking about there is the kind of burden we would have to analyze under 51.09, which is our backfit rule.

In addition, improve NRC's systems to independently verify and retrieve plant licensing basis.

COMMISSIONER ROGERS: What does that mean? I mean, how do I understand how big that effort is? It seems to me that it could be very big.

MR. MIRAGLIA: I think it is a global statement,

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Commissioner Rogers. I think you are correct.

What we are indicating in some of the short-term actions are first steps, and the longer-term actions would perhaps be a more global. In order to take those longer-term actions, we need to do some of the shorter-term so we could fully access and dimension that. This is a very broad goal, as stated. You are correct.

COMMISSIONER ROGERS: Well, yes. When you say independently identify and retrieve plants licensing basis, that means you should be able to do it without any reference to the plant itself.

MR. THOMPSON: To the licensee, you mean?

COMMISSIONER ROGERS: Licensee itself, not the plant license.

MR. THOMPSON: Right.

I think we will discuss some of the steps.

COMMISSIONER ROGERS: It sounds like a very big bite.

MR. THOMPSON: Right. And I think we'll discuss some of the steps that we are going to be taking to enable us to be able to do that as we go through this and to identify those licensing basis issues up front, up early, as we impose them, as there are new ones, and then we will have to decide how we would follow that in backfit space, but certainly, for the forward-looking, I think we will be able

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to address some of the short-term efforts.

MR. GILLESPIE: That is the reason we have this organized in the short- and long-term actions, and it was exactly that same question that the managers in the NRC wrestled with a lot before this report came out, how do we sort through that question, given that there are things we can do in the short term and done now to minimize our exposure and fix the problem from here into the future, but

looking retrospectively back, we have to first gage the size of the problem we are dealing with, both the size and the physical potential, physical work that has to be done to achieve it, and the safety size, how much safety do we perceive we are going to get for the benefit.

As I go through the short-term actions on licensing basis we are proposing, we would identify future licensing basis commitments, and the example of this would be we would change our internal procedures on the way we are dealing right now with license amendments.

Right now, when we issue a tech spec amendment, we generally issue a new tech spec, and there will be an SER attached, maybe a brief SER in some cases and maybe longer in others, and in that SER, there will tend to be what the Staff considered in approving the technical specification that was changed, and in that approval, the Staff will generally recognize what I'll call might be conditional

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statements that the licensee committed to in correspondence in order for us to give them that tech spec.

The more easier one, I'll just keep using it because it's a good illustration, is the SER that was on the computer code. The Maine Yankee had 12 conditions for use. The 12 conditions were, in fact, in the SER. We are now looking at those and trying to understand how we might change our own practices, which would cause those 12 conditions to be incorporated into the FSAR, so that they potentially get into a controlled document, or if there are important enough conditions incorporated into the license itself.

Now, how might that change? It is a procedural question we are working with OGC right now to work up what might be kind of a standard format to do that on a regular basis with each license amendment. That way, we get into a control document as a forward fit on license amendments.

Using NEI guidelines for managing commitments, this is still -- we have endorsed the guidelines. The Commission has endorsed the guidelines, and this is to deal with the retrospective question because we have done it, with the chronology in the past, a number of inspections on industry commitment and management processes, and so we do have some feel that, in general, we have a working system out there. It is not a perfect system, but we found no

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fatal flaws in looking at the past, and this was a further refinement on that.

This was put in place about a year ago. Our intention now would be we're developing an inspection procedure now to go out and look and inspect it for goodness, if you would, to see if it's doing what we think it's going to do. So that's, in the short term, to keep dealing with the past commitments.

Continue implementing the process improvement plant which was sent, the project's process --

CHAIRMAN JACKSON: Let me stop you. For past commitments, I think we talked about this once before. This NEI guideline for managing commitments does have one vulnerability in that it would allow deletion of old commitments using 50.59 criteria; is that correct.

MR. MIRAGLIA: For certain classes. This was a program that the industry came up with and we endorsed, and I believe we -- I don't believe we briefed the Commission, but I think the Commission was informed by a Commission paper about a year ago.

In that process, there is classification of commitments, commitments that are important to the agency, that cannot be changed without our knowledge. Then, there is commitments that can be changed within the context of a 50.59 process, and they would have to inform us and document

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and keep records of those, pretty much like they have to do for a 50.59-type process within the context of 50.59.

Then, there are commitments that would not necessarily fall within the control process, that they could change, but they would need to document and keep records of. So it does have that type of discipline.

The inspection program that Frank is talking about is to go out and say are the -- is the industry utilizing that program in a way that they are putting the commitments in the right kind of categories and are they maintaining and controlling those commitments with the right kind of processes that we can audit and inspect and we would test those elements of the program, and that is one way of looking back at commitment management that is in place at this point in time.

CHAIRMAN JACKSON: Okay. COMMISSIONER?

COMMISSIONER DIAZ: Is that very well defined, our licensing commitments?

CHAIRMAN JACKSON: That is what I was going to say. That is right.

COMMISSIONER DIAZ: The protocol of the initial structure?

MR. MIRAGLIA: The program that we looked at, Commissioner Diaz, had those kinds of elements that sort of defined the threshold and the control elements. It is well

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over a year. We can certainly provide more information and detail and update on that to the Commission.

I am doing that from memory right now, but I think it did establish a threshold. It did establish a categorization and the control processes to be used in each of those categories and what records the utility would have to keep, such that it would be subject to NRC review and audit.

CHAIRMAN JACKSON: How much -- oh, I'm sorry. Go on.

COMMISSIONER DIAZ: I was going to say, are those consistent with present knowledge and established -- have we reviewed them without our present Lessons Learned?

MR. MIRAGLIA: This was a program that the industry said that they would implement about a year ago, and we indicated we would give them time to get that in place. We certainly haven't looked at those programs at all. We would look at them at this point in time.

I think the inspection program would have to say we need to probe in certain areas based upon the lessons learned, and that can be factored into the inspection of that kind of activity.

CHAIRMAN JACKSON: How much of the categorization and the protocols associated with that are dependent upon the definition of terms that show up in 50.59, such as

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shudder margin, you know, probability, other things?

The reason I am asking is that we are talking of having a follow-on Commission meeting in March and a more explicit discussion and potential Commission action on 50.59. So, if we are talking about a commitment management

scheme that relates to criteria laid out in 50.59 in terms of both the categorization and the protocols for managing and disposition of those, is this putting the cart before the wheel, the horse?

MR. MIRAGLIA: It depends on one's perspective.

In terms of 50.59, those issues on 50.59 exist minus this commitment management issue.

CHAIRMAN JACKSON: No. I guess I understand that. I agree with that. The issue is --

MR. MIRAGLIA: And we do --

CHAIRMAN JACKSON: But are these things affected, the way you would actually -- the commitments would be managed relative to what's in here, are they affected by what you are going to be bringing forward to the Commission?

MR. MIRAGLIA: Yes. To the extent that the 50.59 process would be changed, then we would have to make -- codify the same kind of --

CHAIRMAN JACKSON: The corresponding changes.

MR. MIRAGLIA: The corresponding changes with respect to the change process of the commitment management.

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CHAIRMAN JACKSON: Okay. Commissioner McGaffigan?

COMMISSIONER MCGAFFIGAN: I was just going to keep on this analogy that Mr. Gillespie has been using.

If this commitment management system were in place and Maine Yankee had found these 12 commitments or these 12 conditions we put in the license and entered them and then did a 50.59, is that the notion?

MR. GILLESPIE: Yes.

COMMISSIONER MCGAFFIGAN: Could they have just declared that whatever tweaks they needed to get to where they wanted to go were unreviewed safety questions and, therefore, not require -- I mean, could they have ended up where they would have been, anyway, using this process?

MR. MIRAGLIA: I think the answer is probably yes, but it would have been done -- it would have had an auditable trail. It would have had an auditable trail.

I mean, you're talking about absolutes and guaranties, and I don't think I'm prepared to say there is a guaranty about anything.

COMMISSIONER MCGAFFIGAN: Right. So we would have an auditable trail.

MR. MIRAGLIA: Well, but in this case here, if we

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MR. GILLESPIE: If we go back to the philosophy --

MR. MIRAGLIA: That's right.

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MR. GILLESPIE: -- of 50.59 and the word of a term is giving us problems with industry and that is the word "any decrease in safety," if you take 50.59 as -- the thing that tries to maintain the safety envelope that is prescribed by the FSAR and someone does that in good and reasonable faith, then something that would end up reducing safety shouldn't happen, and if it does, yes, we should have the auditable trail that someone crossed the line.

COMMISSIONER MCGAFFIGAN: So giving up these conditions or tweaking them, if we had audited it, we would have said no, that wasn't an -- that there is an unreviewed safety question here --

MR. GILLESPIE: Yes.

COMMISSIONER MCGAFFIGAN: -- and it should have come in for an amendment.

MR. GILLESPIE: It is likely with the strength of those 12 conditions that were placed in the code, that if we

inspected it, we would have made that finding.

COMMISSIONER MCGAFFIGAN: Okay.

MR. GILLESPIE: But it is not an absolute.

CHAIRMAN JACKSON: I mean, there are two pieces, I think, that come out of the Commissioner's comments. One, will this create the auditable trail? Two -- would it have? -- two, then, would we have done the audits? to have caught things that we should have caught?

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But again, this seems like a going-forward solution. I'm interested in the going-backwards solution.

I mean, you've outlined, I think, with talking about identifying future licensing basis commitments using the NEI guidelines, what we have been talking about, and having a system to track planta-specific license and basis commitments and reviewing selected issues as going forward. How are you going the backward look? Because that is the space in which we exist.

MR. MIRAGLIA: And I think what we are attempting to say, Madam Chairman and Commissioners, is that these are reasonable short-term steps that we can implement rather quickly to try to build a fence around the vulnerability.

In addition, some of these short-term solutions will provide us with additional insights as to the scope of the issue out there, the risk significance and safety significance of those, so that we can make reasoned discipline judgments in terms of the longer-term solutions.

CHAIRMAN JACKSON: I understand, but all I am asking is a simple question, Frank. Are we talking about it on a going-forward basis? Is putting this fence around it going to cover the backward look and allow us to do the risk significance, you know, look, or is it merely going to cover the fence, put the fence around the going-forward?

MR. MIRAGLIA: I think it is aimed at doing both,

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Madam Chairman, and if the commitment out there -- and it's a voluntary program, and we have to also -- this is not a regulatory program. This is an NEI program that the industry would voluntarily implement on their own. Consistent with Commission guidance, where we do have a voluntary program, we have been asked to follow up on is that program working.

The sense of the inspections would answer the question, is it an effective program, is it working, are they being categorized, the commitment is being categorized in the right way, are they being controlled in the right way.

If those answers are all positive, then maybe we would have enough confidence to say -- and this is supposedly for all the commitments that are in place -- then that might give us the basis for saying, well, that gives us some confidence that this is sufficient, and then maybe what we would have to say for places that weren't voluntarily doing it is that maybe we need to have it made a mandatory program or extend it further and change rules or regulations or specific requirements.

CHAIRMAN JACKSON: So is everything you have up here under the short-term voluntary actions?

MR. MIRAGLIA: No, no. In terms of the first one, the licensing basis, this would be something we would

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initiate and impose in the future for all future things.

In terms of the NEI guidelines, it's a voluntary

program. I don't believe it met the initiative category where it was an initiative that they all agreed to implement.

It would be, it's out there, a program that's been developed. The NEI coordinated this activity with the agency, and it's an approved -- and it has an endorsement. So utilities could look at and use that program, and now what we are saying, consistent with Commission guidance, we would go out and look to make some judgment of the effectiveness of that program, to manage commitments, such that we can use that information to say what reasonable next steps, including going to some of the longer-term issues, should we do when considering further back for consideration.

CHAIRMAN JACKSON: And how long would you expect to have this voluntary program go on before you would be coming back to make some decisions about what next steps to take?

MR. MIRAGLIA: I think we would need some inspection results at a variety of utilities with a variety of commitment, management tracking systems out there, and I would say that we would probably, six months to eight months of inspection experience out there before we have enough

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information to come forward.

CHAIRMAN JACKSON: Let me ask you this kind of a bomb question. You know, given that, in a certain sense, we got to where we are because we thought there were voluntary things that were being done by the industry relative to design basis, one could argue this is a deja vu kind of a set of statements. What comfort do we take that this would be any different from what got us to where we are in the first place, you know, always keeping the focus on what is most risk-significant? But if you don't have the basis here in the first place, you can't pars it to talk about what has a risk or safety feature.

MR. MIRAGLIA: And what we are doing is we are integrating a number of judgments, Madam Chairman, in this kind of regard.

Certainly, the voluntary programs in terms of the design basis didn't appear to work based upon some of the samples, and that is why we went out with the 50.54(f) letter, specifically on design basis, to further assess where the industry is and to assess their implementation of that type of program.

In addition, that led to the Commission giving the Staff guidance on voluntary programs that, when they are in place, we need to follow up to see and to test the orders, and what we are proposing here in the short-term solution is

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to say, given we have endorsed this commitment management process, given nominally it's in place for about a year or more at most facilities who voluntarily use it, we can get some information on that.

In addition to the concerns that have been raised, we have found FSAR. We did look at commitments. If you go back to the chronology, there were at least two audits that were reported to the Commission in the '92-'94 time frame about how commitments were being managed.

CHAIRMAN JACKSON: Right, nine plants, as I recall.

MR. MIRAGLIA: There were two -- I think there was one audit of nine or 10 plants and one of around seven.

CHAIRMAN JACKSON: But there are 109 plants.

MR. MIRAGLIA: I understand. So, based upon that, there was some recognition that there were commitment management things in place. They appeared to be managing the commitments, and they might provide a basis, and that got extended to the endorsement of this commitment management program.

In addition, some of the things that we have been finding where we have found discrepancies in issues in terms of significance in that, not all of them are significant.

In terms of the FSAR discrepancies, we have provided the report on spent fuel pool cooling to the

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Commission and on the FSAR inspections. So I think we need to get a better -- based upon what we see, in terms of saying should we go further, we feel that we need to have some sample to make the assessment that the next step is a cost-effective step and that we are getting the safety increment that we need and that burden on --

CHAIRMAN JACKSON: I know, and I am telling you, I am sure you told the Commission, you know, five years ago the same thing.

MR. MIRAGLIA: Yes.

CHAIRMAN JACKSON: And I don't disagree with everything you said, but the issue is I want to understand what is going to be different so that, you know, 5, 10 years from now, you know, the next Commission that is sitting here isn't, you know, hearing --

MR. MIRAGLIA: I think one of the things we are committing to is that we will go look, and then we will report back to the Commission and say, in our judgment, it should continue or should we go further, and I can't offer any more than that.

CHAIRMAN JACKSON: Okay.

MR. BORCHARDT: The only other point that I would add is that the short-term actions that are under NRC control here --

CHAIRMAN JACKSON: Right.

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MR. BORCHARDT: -- identifies some concrete steps that can be taken that will add a lot of discipline --

CHAIRMAN JACKSON: Okay.

MR. BORCHARDT: -- to what we had previously exercised, and those are directly under our control, and those are the four short-term actions, minus the one that talks about NEI commitment.

We can inspect that, but we can't enforce it, nor can we mandate that a licensee use those.

CHAIRMAN JACKSON: So you are saying that Points 1, 3, and 4 --

MR. BORCHARDT: Right.

CHAIRMAN JACKSON: -- are specific things that we would do, and are they different than what we have done in the past?

MR. BORCHARDT: Yes.

MR. MIRAGLIA: Yes, they are.

MR. BORCHARDT: No. 1, for example, talks about specifically identifying licensing basis commitments. Well, we have never pointed directly at a commitment and said that's --

MR. MIRAGLIA: Yes, we have, see, and -- don't say never. "Never" is an absolute word. In terms of if you go back to the chronology in 1981, for 1985, for the --

CHAIRMAN JACKSON: That's when I was a child.

MR. MIRAGLIA: I was fairly young then, too. In fact, I might have had black hair back then.

But at that point in time, it was recognized for near-term operating license, and it was internal directives that the Staff, in preparing its SER, needed to identify those things that were significant enough to be captured when in technical specifications, those things that were significant enough to be captured within license conditions, those things that were significant enough that needed to have verification in the field prior to licensing, and we had that discipline for near-term OLS, and that discipline -- we didn't carry through and follow through on what we are saying.

As I said, these issues were looked at and examined by the agency in the past. We have had programs. I think Bill makes a good point. It is adding discipline, and I think what I was trying to say in my opining remarks with respect to vulnerabilities, the short-term actions close the window somewhat.

Does it close it completely on all of the issues? No. Some of the short-term actions, we'll say, we've closed the window or is it closed, give us the information to determine whether it's been closed enough.

CHAIRMAN JACKSON: One second. I think Commissioner McGaffigan wants --

COMMISSIONER MCGAFFIGAN: I was just going to ask two questions. On the issue of commitments, whose responsibility is it to know, track, and identify these commitments? Is it the project manager. Is it the resident? is it both? Who is going to have this documentation?

MR. MIRAGLIA: In terms of the process that we are talking about here, that that licensing commitment -- it would be the technical staff to identify to the project manager and the project manager to put in the appropriate part of the licensing and then track from there on out.

COMMISSIONER MCGAFFIGAN: So the project manager will be responsible?

MR. MIRAGLIA: That is the intent.

COMMISSIONER MCGAFFIGAN: Then, on the NEI guideline for managing commitments, it is voluntary within NEI. It is not an initiative, as you said. Do you have a sense as to how many of the 108 or 109 plants are utilizing the NEI guideline?

MR. MIRAGLIA: No, I don't, but I know there is an industry group that is -- I don't know its acronym, but it's called the commitment management utility group where they have been sharing the information on how they track commitments. So there is a significant number of utilities engaged in that activity. That was the principal body that

NEI operated through.

So I would say that at least the members of that group, which was a significant number of utilities -- and we can provide that paper and some of that background.

CHAIRMAN JACKSON: But we really don't know, really, how many --

MR. MIRAGLIA: No, I couldn't answer it.

CHAIRMAN JACKSON: -- are using the NEI guidelines.

COMMISSIONER MCGAFFIGAN: Would NEI know? Would NEI tell you?

MR. MIRAGLIA: We could ask. We could ask.

CHAIRMAN JACKSON: Commissioner Diaz?

COMMISSIONER DIAZ: It seems to me that looking at this, that the only real bridge that we have between the past, the present, and the future would be this tracking system, to plan a specific licensing basis, and that would be the one that could actually provide you, if we do it right and if we put enough resources on it and maybe if we not only do it by ourselves independently, but jointly with the licensee, that that would be a bridge that would allow you to determine where you are, where you were, and where you are going, and that is the only thing that remains. Is that correct?

MR. MIRAGLIA: I think that is what we say is a
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reasonable starting point to assess those things, to say is the bridge complete and do we have enough knowledge to close it.

COMMISSIONER DIAZ: Is this tracking tool something that we are committed to maintain? Because I think that is the heart of the issue. If we maintain a tracking tool, then 5 years from now, 10 years from now when we get a few gray hairs like you --

MR. MIRAGLIA: Let the record show that it is more than a few and growing by the moment.

[Laughter.]

CHAIRMAN JACKSON: Speak for yourself.

MR. GILLESPIE: If I could, this is the intent here. It is really more than a tool. It is a process.

If I could talk through a license amendment that comes in, it gets an SER. There is an amendment -- let me say there are several what we would now call commitments in it, that we would now say deem to be appropriately incorporated into the FSAR.

The project manager will keep track of those, and then when the FSAR update comes in, as required, he would reconcile. Once he reconciles and it gets into the FSAR and we're assured it is in a controlled document, then the 50.59 philosophy, maintaining the licensing envelope described in the FSAR takes hold, and the individual commitment then

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takes on as an individual sentence or requirement less importance and it is now part of a hole, now 50.59 or the change process is supposed to be the process we were relying on to control that level of safety. Again, it is that catch word.

It maintains the envelope of the FSAR. It gives the licensee the freedom to move around within that safety envelope.

So once you reconcile -- and the words of 50.17(e) are, "Six months after each refueling outage, you get an SFAR in." Once you reconcile, you should not have to maintain an interminable list of those things that get incorporated into the document.

In fact, the amendment package itself might have a tech spec amendment, and then there might be what looks like a boilerplate license condition as a companion to it that says incorporating the six following conditions into your FSAR is the contingency upon this amendment being approved.

As soon as they put it in their FSAR, that becomes a moot license amendment. The tech spec carries. We reconcile to the FSAR, and we have a system that closes.

CHAIRMAN JACKSON: Yes, but that is the whole

point. The system has not always.

MR. GILLESPIE: It has not closed in the past.

CHAIRMAN JACKSON: All we want to understand is

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what you are proposing either in the short term or the longer term is going to close the system.

MR. GILLESPIE: Okay. If I --

CHAIRMAN JACKSON: Maybe we should let you talk, but I think Commissioner McGaffigan wants to say something.

MR. GILLESPIE: Okay.

COMMISSIONER MCGAFFIGAN: I am just trying to -- I mean, I'm putting myself in a project manager's position for a moment, and I know they turn over. There, the person responsible also for keeping the updated FSAR, you know, the agency's copy of it. Is that correct? Or, who is responsible?

MR. GILLESPIE: Yes. The project managers keep a copy. The official FSAR is in the official docket file, and we have a replicate working copy with the project managers.

COMMISSIONER MCGAFFIGAN: These are very large documents, as you said. How does a person -- have you all looked at computerization?

We had a meeting yesterday about computerization and tracking commitments made and materials licenses. Is it important that they be able to see why so and so did such and such maybe five years before, maybe three project managers before, in evaluating an issue that might come before a project manager?

MR. GILLESPIE: If I can keep this in kind of a

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number perspective, if you allow me, we do on the average 10 to 12 licensing actions per facility per year.

COMMISSIONER MCGAFFIGAN: Right.

MR. GILLESPIE: So, if there are three or four commitments for each one, we are only dealing with 30 or 40 items. So it is manageable. It is doable in the short term, but for the most part, without going to an over-computerization initially.

The FSAR report, when it comes in, is supposed to be a summary of all changes to the FSAR. So, lining up what might be a list of 50 or 60 items long to a summary report that is also 50 to 60 items long, it is doable, and it is probably -- even if you used a computer to pull the text up on the screen, someone still has to read and compare the text and say, okay, that is this commitment and that is this commitment, because the machine isn't going to be able to do that for you.

COMMISSIONER MCGAFFIGAN: Right.

MR. GILLESPIE: So I think, short term, we are in a doable range, within the way we are functioning, and it is a discipline we haven't really exercised, the reconciliation to the FSAR.

Now, if you find something not in the FSAR, then, of course, a letter to the licensee or a phone call says, you know, you have lost this commitment, where is it, would

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take place, but it is definitely a future fit.

The short-term actions throughout this presentation are, from here, forward. The longer-term actions are trying to address what we would do to develop information to make the decision on potential rulemaking in the future.

CHAIRMAN JACKSON: Commissioner Diaz?

COMMISSIONER DIAZ: I think following Commissioner

McGaffigan, I think -- and I know you know this, but it is important to point out that even as large as the FSAR is, it is still manageable. What becomes very difficult is when you add the design basis to the FSAR and you have all of these and all of those, the references and things. That makes it very complicated, and that interface is the one that eventually we will need to define, how much of the design basis are we going to have or constituted so we can address it, and that is a very difficult issue.

CHAIRMAN JACKSON: That is what they want to bring to us, you see.

MR. GILLESPIE: And that is where the Commission was extremely careful, I believe, in the policy statement of 1992 in distinguishing between the word "design basis" and "design documentation."

It was never anybody's intent that all the design documentation be incorporated into the FSAR, but

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conceptually, I think we had a thought on what the design basis was, and it is defined in the regulations as to higher-level definition. It is those key parameters and functions that really must work in a certain way. It is those key setpoints. It is those key things that go into the safety analysis.

I am not saying that is a real clear line because I would be the first to admit that the difference between --

MR. MIRAGLIA: But I think it is always recognized the design basis didn't require all the drawings, all the design calculations and all of those type of --

COMMISSIONER DIAZ: And that is where the distinction is made.

CHAIRMAN JACKSON: That is where the line may be able to be drawn.

MR. MIRAGLIA: If you go back to that policy statement, as Frank said, that was clearly articulated in the NUREG that supported some of the studies in that, and we recognized --

CHAIRMAN JACKSON: Does that provide us a basis for going forward and beginning to address the issue, that distinction that the Commissioner is talking about?

MR. MIRAGLIA: I believe so because I think the 50.2 definition that is in the rule is that higher-level definition.

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COMMISSIONER DIAZ: And I believe that the position that was taken at the time was very reasonable at the time. It was understood. It is just that now we have all of this additional knowledge.

I think the clear definition of the interfaces must be restated so we can manage.

CHAIRMAN JACKSON: Okay. Why don't you go -- the longest it's been, half an hour per page.

[Laughter.]

MR. GILLESPIE: The long-term is definitely the retrospective look. It is a prospective look in a sense in my first bullet, and that is defining current licensing basis in Part 50.

We have referenced the term which is not clearly designed in Part 50. It is designed in Part 54. And if we would re-read it, we may, in fact, not want the same definition in Part 50 as part 54, and I think that needs some definite thought put into it.

The Part 54 definition was done in a certain

perspective, and the Part 51 might be in a different perspective.

Compilation of the licensing basis has been addressed in license renewal space, and decisions were made that it would be at that time not beneficial, basically; that it was too costly an effort to have to go to actually .
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list every commitment that ever was and how it was disposed.

To establish regulatory controls for all licensing basis commitments, this is really a bullet that is an expansion, the potential expansion of the base to which 50.59 would apply. 50.59 clearly right now applies to the FSAR, and included in the FSAR is a design basis, but if we were going to pick up answers to generic letters that currently are not in the FSAR or responses to items that are on compliance or confirmatory action letters, clearly, that is an expansion of the use of 50.59, whatever process that ends up evolving not, and that is just in lock-step with what do you want those controls to apply to.

MR. MIRAGLIA: And I think at this point, I would just make a note that these long-term issues were considered just a few years ago in the context of license renewal in that kind of context.

Now the information that we have says we need to go back and revisit some of those, where were we and how did we get to where we are and what do these vulnerabilities say and what should we do with it.

CHAIRMAN JACKSON: Well, I think you have new information. You have a new Commission.

MR. MIRAGLIA: Yes.

CHAIRMAN JACKSON: And you have a new ability to parse things in a way that might allow some --

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MR. MIRAGLIA: That is what I said. They need to be reexamined and reconsidered, but we have to recognize where we have been and how we got to where we are and what does the new information now suggest.

COMMISSIONER MCGAFFIGAN: I am afraid I have two questions. Number one, I don't want to let you off so easy on why there would be a difference in definition between Part 50 and Part 54, why you would not just take the Part 54 definition that presumably people labored over in the license renewal context and plug it in here.

MR. GILLESPIE: If I could, let me give you an example. The definition we are talking about, 10 CFR 50.3, is actually backup slide 21.

When in doubt, I didn't want to paraphrase. In the definition of current licensing basis, it has got a hierarchy of requirements in current licensing basis. It goes from the regulations to the license to technical specifications to the FSAR, and then it goes on, and the licensee's commitments remaining in effect that were made in docketed licensing correspondence, such as licensee responses to NRC bulletins, generic letters, and enforcement actions, as well as licensee commitments documented in NRS safety evaluations or licensee event reports.

Let me take the one on compliance, just as an example. If someone writes in a response to an item of

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noncompliance and says they are going to do certain corrective actions, if they didn't do those actions and we went back six months later and found that it wasn't done, would we take action because they didn't do what they said or would we take action because they didn't fulfill the

fundamental requirement?

What this definition -- I think our action would be, as a former inspector, the citation would be against the fundamental requirement again. You wouldn't be creating a new requirement through the inspection process. So there are some questions like that, that you might say, because there is a lot of paper and a lot of what would be considered commitments coming out of inspection reports; that the way this definition was written, it was intentionally written to be all-inclusive, basically all documents on the docket file, to make sure it encompassed all the information there.

Would we want to continue that in the future?

MR. MIRAGLIA: I think what Frank was saying --

MR. GILLESPIE: That's all I'm saying. In fact, you may reconcile --

MR. MIRAGLIA: You need to go back and reexamine it.

COMMISSIONER MCGAFFIGAN: Okay.

MR. GILLESPIE: If you're going to reexamine the . 51 definition for Part 50, let me say it a different way. We might have to reexamine a consistent definition also in Part 54. I didn't mean to imply they would be different, but they could be.

COMMISSIONER MCGAFFIGAN: They could be for the two purposes.

MR. GILLESPIE: Yes.

COMMISSIONER MCGAFFIGAN: The second item, and I am not sure I am going to paraphrase you properly, but you may be about to get to it, but the notion as to -- that there is a fundamental issue as to what we have and haven't been requiring in the 50.71(e) updates.

And what you said a moment ago, and I won't try to paraphrase it, I think, is consistent with the Staff interpretation that has been propounded occasionally over the years or maybe consistently over the years as to what should and shouldn't be in the FSAR, but you sort of get into the problem of the plain reading of what 50.71(e) says. A plain reading of it isn't necessarily consistent with what the Staff has been saying over the last 15 years.

MR. GILLESPIE: That's true.

CHAIRMAN JACKSON: I think they're going to come to that. I think now is the time for me to become the chairman again. Let's move along.

MR. GILLESPIE: We have eventually touched upon . 52

the design basis. Some licensees not appropriately maintaining the design basis, we continue to see problems with numbers, calculations being incorrectly applied or incorrect ones used.

Some licensees are not appropriately implementing some bases, and some bases are not consistently incorporated into the FSAR, and that statement gets the essence of potentially a literal reading of 50.71(e), which is the FSAR document of which this is a subset. So I will try to rapidly get to that.

What we need to do is provide increased understanding of the design basis, make sure everyone understands the difference between design basis and design documentation because we sometimes use our terms maybe too freely, and greater assurance of facilities or controlling and are in compliance with their design basis.

It is not that they have to necessarily control to our satisfaction every detail and every drawing, but there are certain key things that are designated design basis that should be controlled.

Short term, provide guidance on the use of design basis. We should be identifying in things like generic letters when we expect the reply will, in fact, affect the design basis and be very clear about what it is.

Implement 10 CFR 50.71(e) as basically literally

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read as a future --

COMMISSIONER MCGAFFIGAN: It was in the statements of consideration.

MR. GILLESPIE: Yes.

And I didn't include 50.71(e) as a backup slide, but I did bring it so I could read it without my reading glasses in big print because it is a good, well-worded rule.

Use the responses to 50.54(f) letters to guide us -- provide some guidance on how we are going to be looking at designs specifically in the future and what level of inspection will be appropriate for what facility.

We clearly cannot do the maximum amount of inspection at every facility, and we'd continue the design inspections that we are currently doing, which are basically at two levels. We are doing our more traditional design inspections of system inspections, which are run by the regions, with one or two contractor support people, and we are running the architect engineer programs, which are much narrower, actually, looking specifically at design, will the system carry out its function as intended and is it being carried out as described in as best we can understand the design basis to be included in the FSAR.

Long term, determine if policy or design basis should be -- if the policy on design basis should be codified in regulations. The 1992 policy would probably --

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wording-wise, if I just literally read the policy -- could be edited and turned actually into a rule. That's a long-term option to be looked at.

Determine the benefits of incorporating all existing design basis that backfit into the FSAR, including information which may not currently be there.

CHAIRMAN JACKSON: Go back on the top of that page of implementing 50.71(e) as explained in the statements of consideration. What is that going to fix?

MR. GILLESPIE: In the short term, we are looking at -- it would be probably appropriate to potentially issue a generic letter that says from here on, it would be the Commission's intention to --

CHAIRMAN JACKSON: A generic letter implies a lot of things. Why is that necessary?

MR. MIRAGLIA: It may not be necessary in the classic sense.

MR. GILLESPIE: It may not be necessary.

MR. MIRAGLIA: I mean, I think if you look at 50.71(e), there were two distinct pieces. It is a reporting requirement, and it is also fairly clear in terms of what the content that that update should be, and I think we have been pretty consistent on the reporting requirement and pretty inconsistent as terms of looking at the quality of the content as to whether all of the material that would be

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implicit and explicit based on the rule to be there.

I think the only thing one would have to do is to

be, if you want to characterize, some sort of generic communication to indicate to the industry. Perhaps that hasn't been consistently implied. That was always the intent. And be warned, that is what we are going to start enforcing.

CHAIRMAN JACKSON: But it is not a backfit.

MR. MIRAGLIA: And we would defer to the Office of General Counsel in the application of the 109 process as to how that would play out.

COMMISSIONER DIAZ: How would the design control as explained in 10 CFR 50 Appendix B match into this?

CHAIRMAN JACKSON: Can I just --

MS. CYR: I don't believe it would be back. I mean, demanding compliance with the rule, as it is written, is not a backfit. I'm sorry.

COMMISSIONER DIAZ: Yes, because you are talking, really -- you are differentiating with the design basis and the design recommendation and 50.71(e) as applied to the FSAR. It is design control on -- is it found on the Appendix B list?

MR. GILLESPIE: Well, Appendix B still applies.

COMMISSIONER DIAZ: Yes, but if it is somehow used also by the agency specifically enough, that will provide us .

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some guidance in what the interfaces are.

MR. MIRAGLIA: I think the 50.71(e) would then incorporate certain material clearly within the FSAR, and then that would clearly put it within a control process of 50.59.

COMMISSIONER DIAZ: Okay, 50.59.

MR. MIRAGLIA: I think that's --

MR. GILLESPIE: That's the control process. It becomes 50.59.

MR. THOMPSON: And I think that is one of the other elements that we talk about, the revisions of 50.59 and to bring closure to that as such an integral part of this whole approach.

COMMISSIONER DIAZ: Thank you.

MR. GILLESPIE: Going on to Slide 11, FSAR, which virtually repeats the entire presentation for a design basis because one is contained in the other, but the FSAR is slightly larger, that we found many discrepancies between facilities in the FSAR because the FSAR is the design basis, but it uses the words in what it contains. It is also a facility description. So that's a little more extensive, and in fact, the words "facility description" may in a longer term need to also be looked at by way of understanding what 50.59 specifically applies to in an FSAR and what it doesn't, and the simplistic example would be if .

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the color of a building or something was referred to. Clearly, we don't want someone doing an analysis of the color of a building, but yet, it may be described at that level of detail.

FSARs are not consistently updated relative to their content. They are consistently updated relative to the frequency required, which is something that Frank has already mentioned.

CHAIRMAN JACKSON: Have we provided any guidance for exactly what information? Well, I guess if we haven't been consistently doing it, we haven't been providing any guidance as to what information would be required in the update.

MR. MIRAGLIA: I think within the context of 50.71(e) in terms of the rule and the statement of consideration, there is pretty explicit -- I think you could read -0-

CHAIRMAN JACKSON: So we just haven't been doing it.

MR. MIRAGLIA: And we haven't been consistent. I think it could be rearticulated clearly for everyone to understand what the desire is and to go out and start implementing it in that kind of context.

CHAIRMAN JACKSON: Okay.

MR. GILLESPIE: The intended result of our action, . 58 short term and long term, would be to ensure licensees are updating their FSARs with the appropriate information, to determine if it is necessary to establish a standard level of detail for FSARs because we do have a variability from when they were issued, determine if additional information should be added to updated FSARs.

I might comment on "determine if it is necessary to establish a standard level of detail for FSAR updates." I believe I could say the general practice has been that the FSAR updates tend to update that which is already in the FSAR and tend not to add additional detail.

So, if a system is changed, but a specific set point or something was not originally in the FSAR, it generally would not get put in because of the change. The change would be focused in the change of material already there, which gives you a very reduced scope of what you are changing in your FSAR and leave some things outside of the FSAR.

CHAIRMAN JACKSON: Is that consistent with what the statement of considerations --

MR. MIRAGLIA: I think some of that would be captured by a consistent -- but there are also -- when 50.71(e) was first promulgated, it was recognized that the update applied to the FSAR. In other words, the understanding of variability of content was taken as a

. 59 given, and it was to say as you make changes that needed to be -- could be interested to be in the content. That should be included, and that is what haven't consistently implemented.

So I think, to a large measure, it would capture most. We need to make sure, I think, what Frank is saying that are there pieces that aren't being captured that we need to be assured need to be in.

CHAIRMAN JACKSON: Right. One big piece of it is inherently already there in the existing regulation.

MR. GILLESPIE: Yes.

Short-term actions, implement previous actions --

CHAIRMAN JACKSON: Short-term actions.

MR. GILLESPIE: Short term, implement 50.71(e).

[Laughter.]

MR. GILLESPIE: I didn't think I'd ever get to that bullet. I'm sitting here tense.

It would be to do what we need to do to implement 50.71(e), as written, including any kind of appropriate notifications. It says, hey, this is what we are going to do. Whether that is generic communications or whatever -

CHAIRMAN JACKSON: Send out the statements of considerations.

MR. MIRAGLIA: We need to make sure the Staff understands what we're doing. We'd have to do all those

things, but yes, it can be done.

CHAIRMAN JACKSON: Yes, please.

COMMISSIONER DICUS: You want my question?

Could you give the Commission some insight on what seems to be a very simple question? Why didn't we enforce this regulation? Was it some feeling that it wasn't worthwhile, some reason it was not necessary, or did we just not do it?

MR. MIRAGLIA: The only reason that I can come up with, it is the result of unintended consequences.

I think when terms of FSAR updates -- when we shifted away from the normal licensing function -- and I think it's a matter of evolution, if you look at points in time -- FSAR amendments and updates were very critically looked at up through the point in time of initial licensing.

We became sensitive again after the pause, after TMI-2 in terms of making sure the commitments and the material was put in and commitments were put into the FSAR.

Then, subsequent to the big licensing activity to get the TMI requirements in there, we started to shift to operational focus and design issues. I think, to the extent that commitments dealt with operating procedures and those kinds of things, we would probably have a better line because we looked harder in that area. I just think it is an error of omission as opposed to an error of commission.

That doesn't make it any -- it wasn't conscious decision-making. I think it was just the circumstances at the time and the focus of the agency at that time, and it happened over a period of time, and there is some inconsistent application. That is the best explanation I can offer.

COMMISSIONER DICUS: Just a very quick statement, then. Being consistent is extremely important. I think we all recognize that in everything we do, certainly for the Commission, certainly for our licensees, and certainly for the public.

And then the other thing, I think I have raised this concern previously, so I think it is important to raise it again, and I think you have heard it from other Commissioners and from the Chairman, the balance. We are shifting now over more to the licensing issues, but let's not forget, we still have to do the operational parts, too. So let's be sure we try to stay balanced, as we move forward in this.

MR. MIRAGLIA: That is a consistent theme, and we appreciate it, we understand it, and I think we recognize the responsibility to maintain the focus as well.

COMMISSIONER MCGAFFIGAN: Could I get a --

CHAIRMAN JACKSON: Okay.

COMMISSIONER MCGAFFIGAN: It's just a short

question, and I hope Karen will be able to answer it.

The memo pending before the Commission says there is a possibility that we would also be subject to the Small Business Regulatory Fairness Act, and I will read the bullet, provide guidance to licensees, to implement 10 CFR 50.71(e) as explained in the rule, statement of consideration, and to include an FSAR's new design bases developed at the Commission's request.

Is it the "and" part?

MS. CYR: Right. The question, to the extent that

we were trying to look at whether we needed to require more design detail or try to catch something broader in terms of the design bases, that we would have to look to see whether, in fact, that would rise to the level.

We weren't necessarily concluding that it did. It just meant that we needed to look to see whether the Small Business Regulatory Fairness Act would have some application in that context.

CHAIRMAN JACKSON: But for the first part --

MS. CYR: The 50.71, as written and understood and described in 81.10 and so on, I don't believe so.

CHAIRMAN JACKSON: Okay. Thank you.

Okay. Frank, get going.

MR. GILLESPIE: We will continue auditing the FSARs through the inspection program, and in fact, our

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intent would be to reverse a cleansing we did in the late '80s and early '90s. We took the FSAR references out of a lot of our inspection guidance because we are really forcing to focus on operations, and we are now integrating not all of it back in, but pieces back in, to say, for example, when you look at --

MR. THOMPSON: The admonition of balance.

MR. GILLESPIE: Yes. Well, we are being very careful.

Identifying information to be added to FSARs through generic communications and licensing actions, this would be when we issue a generic communications. When you read 50.71(e), there are words in here which would affect that any time someone basically answers a generic communications, that if that answer affects what is in the FSAR and a design basis, then that answer in and of itself needs to be incorporated into the FSAR, and that is already in the rule.

This would be -- the Staff, when we write a generic letter, showing the discipline when we write it, to make sure we recognize up front what is it we expect from people that will also be in there, be incorporated into the FSAR.

Long-term actions. A relook at our previous actions on defining a compiled licensing basis, and the

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potential of revising Regulatory Guide 170 is, in fact, the format and content guide of what goes in an FSAR for an operating license or an NTOL.

It is very thick, but this would be the guidance that we would probably pick to amend to -- if we needed to amplify any more, what is the process for maintaining the FSAR once you pass the operating license issuance point, and now you are an operating plant, what is the level of detail expected to be in it, is the level of detail consistent with original detail, or is it consistent with the detail needed to describe what you are going to do. It is the different level of detail.

CHAIRMAN JACKSON: This reg guides dates back to 1978.

MR. GILLESPIE: That is correct.

MR. MIRAGLIA: That is correct.

CHAIRMAN JACKSON: It is 20 years old. Okay.

MR. GILLESPIE: The recommendations -- and this is really right from the paper -- that we continue to implement the short-term actions, following the short-term actions, using information that we gain to evaluate the need for different pieces of the long-term action relative to looking

at a redefinition or a definition in Part 50 of licensing basis, and the expansion of what might be considered the applicability of 50.59 to a broader base, and that would be

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the licensing basis that would be defined, and that we would make individual recommendations on the long-term action relative to things like defining licensing basis, 50.59, level of detail, redoing the reg guide if that's deemed to be appropriate, or picking a different reg guide number and putting the guidance out in that form.

With that, that really concludes the presentation. We have included some backup slides.

CHAIRMAN JACKSON: Commissioner Rogers?

COMMISSIONER ROGERS: Yes. I think that some of the things, Lessons Learned here, that have to be emphasized involve -- are lack of consistency. Commissioner Dicus has emphasized that a number of times, and I think it is really important.

This comes back to fundamental definitions of things, and I think that as we get into this, this type of activity, I think it is terribly important that we try to make sure we are looking at everything we do that is connected. Most of these things are connected in some way, and to see where are, employing words, that we know what we mean, and we don't imply that the meaning in one place is going to be the same as in another place unless we are sure we want it to be that way. It could be. It might not be.

I think that many of the things that we are doing here reflect a recognition that we could have done some

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things better in the past, but for various reasons, life doesn't always go that way.

I think one of the things that I would like to see come out of this is a very high-level look at these issues from a policy perspective. That is what you are trying to do, but a lot of these are getting into nitty gritty applications of policy very soon.

So I think that the attention to consistency and detail and definitions and, in fact, being very clear on what we mean by terminology, that somehow we have employed in the past in a way that, well, we all know what it means, except we don't all know what it means, 10 or 15 years later.

We talked about the project manager role in this. I think the shifting of project managers that we talked about, rotation of project managers makes it all the more important. The documentation available to every project manager really says what has to be known about that plant.

My understanding is that when a new project manager takes over, it takes several years to become really familiar with just the documentation of the plan. I think we have got to find a better way to do that, and I think our information systems can help us there, new electronic information systems, and we ought to make sure that we employ them so that one doesn't have to plow through tons of

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paper to get at the essential understandings that are necessary.

So I think these are all things very important to keep in mind, and one other point that I feel very strongly about is I think we have to understand what the resource demands are going to be on the Commission and on our licensees in carrying out this full program. It has a

beautiful completeness to it and it's very appealing, but I have to tell you, I am very worried about what the resource demands are going to be in actually carrying this out, both in-house and on our licensees.

I would really like to see how we answer the question, what are the safety benefits that we are going to buy, by doing this. I think it is a very fine kind of activity, but I would really like to see what the safety payoff is, and I would really like to know what the cost in FTEs and dollars is going to be.

CHAIRMAN JACKSON: I would think that most of the longer-term actions that you proposed have built into them the cost benefit backfit-type requirements, at any rate, would force us to address those issues that Commissioner Rogers raised in terms of resource implication.

MR. MIRAGLIA: And our intent was, after initial feedback, since these -- these things are, as you said, Commissioner Rogers, very interrelated, and as I said, we

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have I looked at these issues singularly before in discussions, some of the debating on approaches. Well, what are we saying different here than we have said here? We said, well, gee, we haven't really said it different. It is consistent, but we have never really put the two together and take an integrated look. So you have a slightly different context.

I think your comments are well taken. I think what we are trying to do here is identify those high-level issues, some reasonable first short-term steps that, as I say, narrow the vulnerabilities and provide us some input to make those kinds of -- provide the regulatory analysis in terms of the longer term, to understand what the full implication is, not only on ourselves, but also our licensees, to get some measurement of the risk and safety benefits. That is so we can make some conscious decisions.

So it has to be a disciplined process. What we need to do is try to integrate these short-term actions and how do they feed these and over what time frame would we be prepared to come forward. I think the memo from the EDO to the Commission says 90 days after feedback, we will try to come up with an integrated plan saying how the pieces come together and what we would plan to come forward with at each point in place.

COMMISSIONER ROGERS: Excuse me just for a second.

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Let me touch on one more point, and then I will be finished.

I notice that we touched on the use of the statement of considerations in one connection here, and I would like to just point out that we haven't always been entirely consistent in what we say in the statement of considerations and what the rules say. It has tripped us up a couple of times in the past when somebody points that out to us, and I think that this is also a time to look at that kind of consistency.

Sometimes I've had the feeling that whoever wrote the rule and whoever wrote the statement of considerations were just different people, and they chose to use different language because it seemed to explain things a little bit more clearly or a little differently, and the net result is a difference.

I don't think there should be any differences at all. There was no intent, but it does creep in. So, again, it is an issue of consistency that is very important.

MR. MIRAGLIA: That is a fair comment.

CHAIRMAN JACKSON: Commissioner Dicus?

COMMISSIONER DICUS: Just to emphasize quickly, I think the actions that seem to be laid out here are going to be useful, but emphasize that short-term actions are, indeed, short term, and the Commission could expect to see some definitive activity in the very near future on them.

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CHAIRMAN JACKSON: Commissioner Diaz?

COMMISSIONER DIAZ: Thank you.

Let's see. I have a statement. I don't know whether I can read it because I never read any of my own notes, a statement on that challenge.

I think what we are seeing is an increased level of awareness on the part of the Staff and Commission, and hopefully the licensee, about how these different parts interact with each other, and I believe that looking at the word balance is that we actually have a mechanism to provide balance.

I am going to read something I just wrote a moment ago. It says the balance between the licensing base is the FSAR, the design basis. An operational safety comes through the inspection and assessment process. That balance is reflected in what we do, and it is reflected on resource utilization. Therefore -- and it comes to challenge.

When we talk about integration, which is really needed, we need to integrate the entire process of inspection from, you know, the resident inspector to how we process it through the licensee events reports, through the SALPs, through all the other different levels, simplify that so that every level can be as clear and as independent of the next level as possible. We will repeat information continuously from the inspection process all the way through

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the end, and we can magnify it rather than simplify it.

So, if we are concerned about resources and balance, we have the mechanisms if we simplify them to introduce the balance and balance the design basis with operational safety and resources, but that means that -- and here is the challenge -- that we need to look at all of these things together. We cannot look at 50.59 independently of how we do inspections. Every one of these things is part of the whole, and I agree with Commissioner Rogers that these are major policy decisions, and we should look at them together, not as independent points, and that the total effort is going to result in a much better product.

CHAIRMAN JACKSON: Commissioner McGaffigan?

COMMISSIONER MCGAFFIGAN: I want to just follow up on one point that Commissioner Rogers made, and I do think statements of consideration and rules sometime differ, but in this case, I think they don't. I mean, unfortunately for the Staff and the interpretation that has been used for the last 15 years, the rule itself, which I have in small print in front of me and can still read, you know, is -- the updated FSAR shall be revised to include the effects of a lot of things, but the last of them is all analyses of new safety issues performed by or on behalf of the licensee at the Commission request, and that's things that we haven't

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been asking for clearly, you know, the effects of new rules and generic letters and all that. I mean, it just clearly falls under that language.

MR. MIRAGLIA: The Staff has put itself on report,

sir.

COMMISSIONER MCGAFFIGAN: Yes. This is not a case where there is a disconnect. It is clear.

CHAIRMAN JACKSON: Well, thank you.

As you have heard, on behalf of the Commission, I want to thank you for briefing the Commission on your overall approach and recommendations in each of these areas related to licensing basis, design basis, and FSARs, and you have given us summaries of both short-term -- proposed short-term and long-term possible corrective actions related to the various deficiencies or vulnerabilities.

The beauty is it has helped to clarify for the Commission how these issues, as you have heard, are intertwined and obviously interdependent.

Now, we do recognize that you need additional time to develop the details of your integrated plan, particularly relative to the long-term actions, particularly as they are fed by the shorter-term ones, but the long-term changes in particular and certain aspects of the short-term changes are actually dependent on whether the changes will be made to certain existing regulations, 10 CFR 50.59 being the most

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obvious example.

So I think the Commission will be better prepared to discuss the future direction, particularly relative to the longer-term changes, and evaluate them to address conditions that exist because of past practices following an integrated review of your Lessons Learned paper and the 50.59 paper.

As I indicated in my opening comments, that Commission meeting to discuss the 50.59 issues will be on March 10th, and we will consider release of the paper associated with that meeting as soon as possible.

As you have heard over and over again, and you said yourselves that these issues have digressed to this point in one decision at a time, and as you have heard from essentially everyone at the table, they obviously now are being considered in an integrated fashion, which is the way they need to be considered.

Licensees have recognized the importance of commitments and that plant changes should be evaluated against, in fact, more than the FSAR. The NRC has recognized the importance of 50.59 for various reasons and has struggled to provide adequate guidance, but the bottom line is kind of this. You know, the plant system engineer who is preparing an evaluation of a system modification or a procedure change and the NRC inspector in the field who is,

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quote/unquote, "looking over the engineer's shoulder," perhaps, both need clear guidance, and this clear guidance should be rooted in a firm regulatory and safety basis.

It is interesting because I think the difficulty of dealing with things one at a time, at a time, at a time, is that when there finally is a comeuppance about something, there is a tendency to throw the baby out with the bath water.

We have heard various ones talk about balance and consistency. What happens is, if we don't do the integrated look and don't really try to fix the problems, when we go out to redress a problem, it looks like we are actually having to swing the pendulum or people worry about our swinging it too far back because we have gone too far in the other direction.

The only way to do that is to have the kind of

consistency and balance and risk-informed judgment, but also to enforce our regulations that we have, particularly when there isn't some inconsistency between what the statements of consideration may say and what the regulations say.

You know, there is no reason not to do that, and we get ourselves into trouble in terms of apparent lack of consistency and lack of balance when we don't do it because, when we don't do it, we lose our way. When we don't do it and we redress it, people say we don't have balance, that we .

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are somehow swinging the pendulum too far the other way, and all it had to do with is whether we were consistently in a consistent way using what tools we already had, that is, even as we talk about the need or no need to develop more tools.

So that is the thing that strikes me in all of this, is that if we have tools available to us and we don't use them and things get out of whack, to bring them back seems to be so very difficult, and it strikes me that yes, we should be dealing with the resource demands on the Commission and the licensees for a full program, particularly with respect to the longer-term actions, but there is no need not to get on with most of the short-term things.

The only thing I would add is I agree with Commissioner Diaz that the connection of what ties licensing basis, design basis, and FSAR together is inspection and assessment, and in the end, our enforcing our own regulations.

So, unless there are some additional comments, we are adjourned.

[Whereupon, at 3:40 p.m., the briefing was adjourned.]