## ATTACHMENT 1A OFFICIAL TRANSCRIPT OF PROCEEDINGS NUCLEAR REGULATORY COMMISSION

## PUBLIC ENVIRONMENTAL SCOPING MEETING FOR LICENSE RENEWAL AT CATAWBA 1 AND 2

EVENING SESSION ROCK HILL, SOUTH CAROLINA

TUESDAY, OCTOBER 23, 2001

## **Official Transcript of Proceedings**

## **NUCLEAR REGULATORY COMMISSION**

Title: Public Environmental Scoping Meeting for

License Renewal at Catawba 1 and 2

**Evening Session** 

Docket Number: 50-513 and 50-414

Location: Rock Hill, South Carolina

Date: Tuesday, October 23, 2001

Work Order No.: NRC-061 Pages 1-61

NEAL R. GROSS AND CO., INC. Court Reporters and Transcribers 1323 Rhode Island Avenue, N.W. Washington, D.C. 20005 (202) 234-4433

	1
1	UNITED STATES OF AMERICA
2	NUCLEAR REGULATORY COMMISSION
3	++++
4	PUBLIC ENVIRONMENTAL SCOPING MEETING FOR
5	LICENSE RENEWAL AT CATAWBA 1 AND 2
6	DOCKET NUMBERS 50-513 AND 50-414
7	++++
8	TUESDAY,
9	OCTOBER 23, 2001
10	++++
11	ROCK HILL, SOUTH CAROLINA
12	++++
13	The Public Meeting was held at 7:30 p.m. at Rock Hill City Hall, 155
14	Johnston Street, Mr. Chip Cameron of the NRC, facilitating.
15	PRESENT:
16	CHIP CAMERON
17	RANI FRANOVICH
18	JIM WILSON
19	MIKE CHANNELL
20	GARY PETERSON
21	MARGO ROTT
22	ANGELA VINEY
23	GREGG JACOY
24	JANET ZELLER
25	LEWIS PALTRIE
•	

1	P-R-O-C-E-E-D-I-N-G-S
2	(7:30 p.m.)
3	MR. CAMERON: Good evening, everybody. Welcome
4	tonight, welcome to the NRC's environmental scoping meeting on the
5	environmental impact statement on Duke Power Duke Energy Corporation's
6	application to renew the operating licenses for the Catawba Nuclear Stations.
7	My name is Chip Cameron. I'm Special Counsel for Public
8	Liaison at the Nuclear Regulatory Commission, and it's my pleasure to serve
9	as your facilitator for tonight's meeting.
10	I wanted to cover three things with you before we get started:
11	One, the objectives for the meeting, two, the format and ground rules for
12	tonight's meeting, and, three, I just wanted to briefly go over the agenda, so
13	you know what to expect tonight.
14	In terms of objectives, the first objective is for the Nuclear
15	Regulatory Commission, the NRC, to explain to you what the process of license
16	renewal is all about and, specifically, to talk about the environmental review
17	that's done by the NRC in connection with deciding whether an application for
18	license renewal should be granted or denied.
19	Scoping is a term that's used in connection with the
20	preparation of an environmental impact statement by a federal agency. And
21	as you probably know, an environmental impact statement, usually called an
22	EIS, is a document that assists the agency, in this case, the NRC, in making
23	a decision on a particular action, in this case, the application to extend the
24	licenses for the Catawba Nuclear Stations.

Now, scoping helps the NRC to identify what information they

should look at in the environmental impact statement, what types of potential environmental impacts might there be from the renewal of the license application - what types of alternatives to the renewal of the license application should be looked at.

And this brings us to the second objective of tonight's meeting, the most important objective, which is to listen to any comments, suggestions, recommendations that all of you in the public may have on what should be within the scope of the environmental impact statement. What types of information, what types of impact should be looked at?

The NRC is taking written comments on these issues, and the NRC staff will be explaining to you in a minute how those written comments should be submitted. But we wanted to be with you tonight personally to talk with you. And there may be some things that you hear tonight from others in the audience, from the NRC speakers that will help you to prepare any written comments that you might want to submit. But your comments tonight will carry just as much weight as any written comments that we have.

The format for the meeting tonight, we're going to do two segments, one being short presentations by the NRC staff on various aspects of the license renewal process, and then we're going to have a question and answer session after each of those presentations. We want to make sure that you understand the background, the process that the NRC uses before we go on to the second segment of tonight's meeting, which is to hear from any of you who wish to make a more formal statement to the NRC to give information that should be considered during the preparation of the environmental impact statement process. And we do have a sign-up sheet or rather sign-up cards

out there. I believe that many of you have taken advantage of that to sign up to speak tonight. And we're looking forward to hearing from you tonight.

In terms of ground rules, they're very simple. We want to make sure that everybody who wants to talk tonight has an opportunity to talk. So to make sure that we can do that, I'm asking everyone to be concise in their formal statements, and we have a five-minute guideline for your statements tonight. And I would just ask you to try to follow that, if you could.

When you come up to -- if you have a question during the question and answer, I'll bring you this talking stick out, and just please tell us your name and your affiliation, if appropriate. We are taking a video/audio tape of tonight's session so that we want to get you on the record. And I would also ask that only one person speak at a time so that we can not only get a clean audio/video tape, but also that we can give everyone the courtesy of our full attention tonight, whomever has the floor at the moment.

The agenda, we're going to start with Rani Franovich who is right here, and Rani is the Project Manager on the safety aspects of the Catawba license renewal applications. And Rani is going to be telling us -- giving us an overview of the whole license renewal process. And you'll see that there is a safety evaluation that the NRC performs, looking at safety issues related to the Catawba Station. There is environmental aspects, and that's what the main subject of the meeting is tonight. This is a scoping meeting on the preparation of the environmental impact statement.

And then there will be inspection findings. All of these will be factored into a decision by Rani and her branch chief who is here, Chris Grimes, Chief of the License Renewal and Standardization Branch. They look

at all that information and they make a recommendation to the Commission on whether the license application should be granted or denied. And then the Commission makes a decision on that. And Rani's going to give us that overview. And then we're going to go to Jim Wilson, who's right here. He's the Environmental Project Manager for the license renewal application at Catawba. And Jim is responsible for shepherding the preparation of the environmental impact statement through, and you're going to be hearing about the environmental process from Jim. And I should just tell you a little bit about Rani and Jim in

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

25

terms of their background. Rani has a background in human factors engineering, a bachelor's degree in psychology and a master's degree in industrial systems engineering. And she knows the Catawba Plant well, because she was an inspector there for six years. And she's been with the NRC for approximately ten years.

Jim Wilson has been with the NRC for about 25 years. He has a background in environmental sciences, as you could imagine. He has a bachelor's in biology, he has a master's degree in zoology. He also has patriotic shoes on that you --

(Laughter.)

-- might have noticed tonight. But I just want to thank you for the NRC for all coming out to be with us tonight. This is a very important decision that the NRC has to make, and it takes it seriously, and its looking forward to getting some information from all of you tonight to help the NRC make that decision.

And with that, I'm going to turn it over to Rani for our first presentation. And then we'll back out to you for questions. Rani?

MS. FRANOVICH: Thank you, Chip. Good evening. As Chip indicated, I'm Rani Franovich. I'm the Project Manager for the safety review of the application for license renewal for the Catawba Nuclear Station, as well as the McGuire Nuclear Station.

Before I talk about the license renewal process, I'd like to spend a few minutes talking to you about the NRC, the Nuclear Regulatory Commission, what we do, what our mission is. The Atomic Act of 1954 authorizes the NRC to regulate the civilian use of nuclear materials. The NRC's mission is threefold: To ensure adequate protection of public health and safety, to protect the environment and to provide for the common defense and security. The NRC consists of five commissioners, one of whom is the NRC's Chairman, and the staff.

The regulations enforced by the NRC are issued under Title 10 of the Code of Federal Regulations, commonly called 10 CFR in the nuclear industry. The Atomic Energy Act provides for a 40-year license term for power reactors, but it also allows for license renewal. The 40-year term is based primarily on economic and anti-trust considerations, rather than safety limitations.

Major components were initially expected to last 40 years, for the life of the plant. However, operating experience has demonstrated that some major components do not realistically last for that long. An example of that is steam generators. For that reason, a number of utilities have replaced major components, such as steam generators. Because components and

structures can be replaced or reconditioned, plant life is really determined primarily by economic factors.

Applications for license renewal are submitted years in advance for several reasons. If a utility decides to replace a nuclear power plant, it could take up to ten years to plan and construct new generating capacity to replace that nuclear power plant. In addition, decisions to replace or recondition major components can involve significant capital investment. As such, these decisions involve financial planning many years in advance of the extended period of operation.

Duke Energy Corporation has applied for license renewal under 10 CFR Part 54 and requests authorization to operate the Catawba Nuclear Units for up to an additional 19 years. The current operating licenses for Catawba Units 1 and 2 will expire in 2024 and 2026, respectively. Next slide, please.

Now, I'm going to talk about license renewal, which is defined in 10 CFR Part 54, or the License Renewal Rule. That License Renewal Rule defines the regulatory process by which a nuclear utility, such as Duke Energy Corporation, applies for a renewed operating license. 10 CFR Part 54 incorporates 10 CFR Part 51 by reference. 10 CFR Part 51 provides for the preparation of an environmental impact statement, or EIS. The license renewal process defined in 10 CFR Part 54 is very similar to the original licensing process in that it involves a safety review, an environmental impact evaluation, plant inspections, and review by the Advisory Committee on Reactor Safeguards, or the ACRS.

The ACRS is a group of scientists and nuclear industry

4

5 6

7

8 9

10

11

12

13

14

15

16

17

18

19

20 21

22

23

24

25

experts who serve as a consultant body to the Commission. The ACRS performs an independent review of the license renewal application and the staff's safety evaluation. And they report their findings and recommendations directly to the Commission. Next slide, please.

I'm going to stand aside so I can point to this graphic. This slide illustrates two parallel processes: the safety review process and the environmental review process. These processes are used to evaluate two separate things. The safety review involves the staff's review of the technical information in the license renewal application. That's this process here. The staff assesses how the applicant proposes to monitor or manage aging of certain components that are within the scope of license renewal. The staff's review is documented in the safety evaluation report, that's here, and the safety evaluation report is provided to the ACRS for review. An ACRS report on their review of the staff's evaluation is prepared, and that's reflected here.

The safety review process also involves two to three inspections, right here. These inspections are documented in NRC inspection reports and are considered with the safety evaluation report and the ACRS report in the NRC's decision to renew a nuclear unit's operating license.

If there is a petition to intervene, if sufficient standing can be demonstrated, and if an aspect within the scope of license renewal has been identified, then hearings may also be involved in the process. Here. These hearings will play an important role in the NRC's decision as to whether or not an application for renewal will result in a renewed operating license.

At the bottom of the slide is the other parallel process for the environmental review, here, which involves scoping activities, the preparation

of a draft supplement to the generic environmental impact statement, solicitation of public comments on the draft supplement and then the issuance of a final supplement to the generic environmental impact statement. This document also factors into the Agency's decision on the application. During the safety review, the staff assesses the effectiveness of existing or proposed inspection and maintenance activities to manage aging effects applicable to a defined scope of passive structures and components. Part 54 requires the application to also include an evaluation of time-limited aging analyses, which are those design analyses that specifically include assumptions about plant life, which is usually about 40 years.

Current regulations are adequate for addressing active components, such as pumps and valves, which are continuously challenged to reveal failures and degradation such that corrective actions can be taken to address those. Current regulations also exist to address other aspects of the original license, such as security and emergency plans. And these current regulations will also apply during the extended period of operation.

In August, the NRC issued a Federal Register notice to announce its acceptance of the Duke Energy application for renewal of the operating licenses for Catawba and McGuire. The notice also announced the opportunity for public participation in the process. The NRC has received two petitions to intervene, one from the Nuclear Information and Resource Service and the other from the Blue Ridge Environmental Defense League.

An Atomic Safety Licensing Board has been established to preside over the proceedings. In an order issued on October 4, the Commission directed the Board to decide within 90 days whether the two

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

1	petitions for hearing will be granted. If a hearing is granted, the Commission
2	has ordered the Board to set a schedule for conducting the hearing with the
3	goal to issue a Commission decision on the license renewal application in
4	about 30 months.
5	This concludes my summary of the license renewal process
6	and the staff's safety review. Before I pass the microphone to Jim Wilson, are
7	there any questions that I can address?
8	MR. CAMERON: Yes, sir. Let me bring this out to you, and
9	if you could just tell us your name, please.
10	MR. JOCOY: I may not need it. My name is Gregg. I realize
11	this is a license renewal hearing. The question I have for you is has the
12	Nuclear Regulatory Commission ever denied a license request to any utility for
13	a nuclear power plant?
14	MS. FRANOVICH: Let me make sure I understand your
15	question. You want to know if the NRC has ever denied the issuance of a
16	renewed operating license?
17	MR. JOCOY: No, ma'am. From the ground up. In other
18	words, has any utility ever come to the Nuclear Regulatory Commission and
19	said, "We want to build a nuclear power plant here," and had the NRC say, "No,
20	you can't."
21	MS. FRANOVICH: To tell you the truth, I don't know the
22	answer to that.
23	MR. JOCOY: Does anyone?
24	MR. CAMERON: Yes. We're going to try to find that answer
25	for you. I'm going to go to Chris Grimes on this one, who can explain I think

1	he can give some information on that question.
2	MR. GRIMES: Yes. My name is Chris Grimes. I'm the Chief
3	of the License Renewal and Standardization Branch. And the answer to that
4	question is we've had some applications that have never been finished,
5	applications for site permits or applications for construction for which the
6	construction was never realized. It never reached a point where the
7	Commission denied the license, it was just never fulfilled.
8	MR. JOCOY: That was done for economic reasons. What
9	I'm asking
10	MR. CAMERON: Glen, could I ask you, we need to get this
11	on the record, so it's not just a question of hearing you. Chris, I think you got
12	the
13	MR. GRIMES: I got the gist of it.
14	MR. CAMERON: drift of what he said. Can you expound
15	on that?
16	MR. GRIMES: Yes. My response yes, my explanation is
17	not necessarily economic decisions. There may have been conditions that
18	would have to have been fulfilled in order to satisfy siting requirements or
19	safety requirements that did involve more than the utility was prepared to meet.
20	So we've never reached a point where the utility has insisted on pursuing a
21	license application with conditions that they were not willing to accept so that
22	we would have to deny it. It's just like applying for a driver's license and not
23	passing the test.
24	MR. CAMERON: Okay. Thank you very much. Let's go right
25	out here. Don?

1	MR. MONIAK: I have a follow-up to that and then one other
2	question. Could you provide some citations of which cases those were. Not
3	tonight, but could we be provided that, especially if it did involve some problems
4	with siting that they were unwilling to go further with because of safety reasons
5	or because I would love to see those cases. Let me leave it at that.
6	Okay. I'd like to know what is the definition of "common
7	security and defense," especially as compared to national security?
8	MS. FRANOVICH: Well, given that the NRC's statutory
9	authority is to regulate the civilian use of nuclear materials, then it would be
10	along the lines of making sure that those nuclear materials were handled safely
11	and safeguards were in place to ensure that they were not out of the
12	possession of those people who were licensed to handle and use those
13	materials. Would you like to add anything to that, Chris?
14	MR. MONIAK: Could I follow-up to that?
15	MR. CAMERON: Yes, sure, sure. But, Don, Don again,
16	Don, I have to get you on the system, okay? And I just want to make a note:
17	Chris and can NRC staff note that we're going to get some information, the
18	citations that Don talked about. Go ahead, Don.
19	MR. MONIAK: Okay. So safety is tracking and accounting
20	for nuclear materials. How many missing sealed sources are there?
21	MS. FRANOVICH: I don't have the answer to that.
22	MR. MONIAK: Any kind of rough estimates, percentage-
23	wise?
24	MS. FRANOVICH: I have no information with regard to that,
25	but we can get that for you.

1	MR. MONIAK: That would be good.
2	MS. FRANOVICH: Sure.
3	MR. CAMERON: Okay. I don't know if Tim Harris or Tim
4	Johnson, anybody here from that side of the NRC that deals with sealed
5	sources. We don't have any information to offer on that right now, I guess, is
6	that right?
7	AUDIENCE MEMBER: It's all the same agency.
8	MR. CAMERON: Okay. Right. Same agency but the people
9	who have that knowledge are not here, and we'll get that for you. Other
LO	questions?
L1	MS. FRANOVICH: Okay. Thank you.
L2	MR. CAMERON: Okay. Thank you, Rani. Now we're going
L3	to go to Jim Wilson who's going to talk about the environmental review process,
L4	and then we're going to go out to you for questions.
L5	MR. WILSON: My name is Jim Wilson. I'm the
L6	Environmental Project Manager for the NRC's environmental review of Duke's
L7	application for license renewal at the Catawba Station.
L8	The National Environmental Policy Act, NEPA, was enacted
L9	in 1969. It requires that federal agencies use a systematic process to consider
20	environmental impacts during certain decisionmaking proceedings regarding
21	major federal actions. NEPA requires that we look at the environmental
22	impacts of the proposed action and consider mitigation measures to reduce
23	impacts if they're judged to be severe.
24	NEPA requires that we consider alternatives to the proposed
25	action and that we evaluate the environmental impacts of those alternatives.

1 And and

And, finally, NEPA requires that we disclose all of this information to the public and invite their participation to evaluate it.

The NRC has determined that it will prepare environmental impact statements associated with license renewal at nuclear power plants. Therefore, following the process required by NEPA, we're engaged in the preparation of a draft environmental impact statement to describe the environmental impacts of operation for an additional 20 years at Catawba. As we noted in our Federal Register notice last month, we're conducting scoping to determine what issues ought to be included in that environmental impact statement, and this meeting tonight and one this afternoon are part of that scoping process.

This slide describes the objective of our environmental review. Simply put, we're trying to determine whether the renewal of the Catawba license is acceptable from an environmental standpoint. Whether or not that option is exercised, whether Duke ever really operates the plant for an additional 20 years, is not up to NRC. That would be an economic decision made by Duke Energy. What we're doing is determining whether this is a viable option for them to consider. Next slide.

This slide shows in a little more detail the bottom line of one of Rani's previous slides. It shows the environmental process. We received the application from Duke in June. We issued a notice of intent in the Federal Register, announcing that we were going to prepare an environmental impact statement and conduct scoping. And we also invited, in that Federal Register notice, public participation to provide comments on the scope of the environmental impact statement.

This is the second of two meetings we're having during the scoping period which ends in November, November 22. Up until that time, you can provide your comments in writing to us. You can also send them to an email address, which we'll provide you with, or you can give your comments orally here tonight.

During the next couple of months, we're going to be conducting the environmental review, and in the spring time frame, in the May/June time frame, we'll be issuing a draft environmental impact statement for comment, and then we'll be holding another series of public meetings here in Rock Hill to get your comments on that document.

After we gather the comments on the draft, we'll consider the comments that are offered up by the public and other agencies and make appropriate revisions to the draft document and issue a final document, and that will be in about January of 2003. Next slide.

Currently, we're in the middle of information gathering process. During the preparation of our environmental impact statement, we have been to the site with a team of individuals with scientific and technical backgrounds in the disciplines necessary to prepare an environmental impact statement. We're going to be meeting with local officials, we've been meeting with state resource and permitting agencies to discuss the environmental impact statement and get some information from them about things that should be included. And we've been reviewing Duke's application. We've been looking at almost 20 years of operating data collected by the plant since it was constructed. And we're going to be considering all of these when we put our environmental impact statement together. Next slide.

1	As I indicated before, we have a team of about a dozen
2	scientists and engineers from four of our national laboratories that are going to
3	be helping us to prepare our draft environmental impact statement specific to
4	the Catawba site. This slide gives you an idea of the expertise and the
5	technical disciplines we're going to be evaluating. We're going to be looking
6	at ecology issues, aquatic and terrestrial ecology, looking at endangered
7	species, EMF field electric shock, public health issues involving radiation
8	exposure and thermophylic microorganisms, socioeconomic issues, and
9	environmental justice Quite a number of different disciplines will be
10	evaluated in depth in the environmental impact statement.
11	This next slide shows that I'm the Agency point of contact for
12	this environmental review. You can contact me directly if you have questions
13	about the review. The application is available or will be available on the web
14	as soon as our web page goes back up. But there's a copy of the application
15	and related documents in the York Public Library next door. Next slide.
16	This last slide gives details on how to provide comments on
17	the scope of the environmental impact statement. You can give them at this
18	meeting today, you can provide them in writing to the address given before
19	November 22, or you can use the e-mail address, catawbaeis@nrc.gov, and
20	we'll get your comments that way. Are there any questions about the
21	environmental review?
22	MR. CAMERON: Questions from anybody? All right.
23	MS. OLSON: Mary Olson. You mentioned microbial review
24	in terms of radiation impact and what tell me a little bit more about that and
25	also how I could find out more beyond this meeting about that?

1	MR. WILSON: The issue we're talking about here is
2	Naeglaria fowleri, an organism that's sometimes found in cooling tower basins
3	that can be spread in an aerosol. <u>Legionella</u> is another organism that could
4	have an impact on the environment, on public health during the renewal period.
5	These are discussed at some length in the generic environmental impact
6	statement, but we'll be looking and checking with the State Health Department
7	to see if they have any indication that this would be a hazard around this
8	particular plant.
9	MS. OLSON: So it will be included in the supplemental.
10	MR. WILSON: We would address it in the supplement, right.
11	MS. OLSON: And I would contact you to get more specifics
12	about that?
13	MR. WILSON: Sure.
14	MS. OLSON: Okay.
15	MR. CAMERON: Okay. Thank you. Any other questions?
16	All right.
17	AUDIENCE MEMBER: Yes, I'd like to clarify something from
18	earlier today. The question was asked how many supplemental environmental
19	impact statements have been conducted and how many other plants have been
20	relicensed? Now, I only know of Calvert Cliffs and Oconee. Are there other
21	ones that have been completed?
22	MR. WILSON: Yes, there are. We've issued five
23	environmental impact statements to date. Calvert Cliffs and Oconee were the
24	first two. We also issued one for Arkansas Nuclear 1, near Russellville,
25	Arkansas and one for Hatch over at Baxley, Georgia. And the most recent is

1 Turkey Point down south of Miami, in Dade County, Florida. 2 AUDIENCE MEMBER: Those are all completed 3 environmental --4 MR. WILSON: We've issued a draft on the Turkey Point 5 environmental impact statement, and we're preparing the final document to be 6 released early next year. 7 AUDIENCE MEMBER: Okay. MR. CAMERON: Other questions on the 8 All right. 9 environmental review process? Okay. Thank you. Thank you, Jim. And, again, I just want to remind the NRC staff that we have two, as far as I know, 10 11 issues that we're going to get some information on. 12 Now, we're going to start the second segment of our meeting, 13 and that's to hear from all of you, and we're going to go to the local government 14 official first. Then we're going to hear from two officials from Duke Energy 15 Corporation to give us some background on the license renewal application. And then we're going to go out to others of you who have signed up to speak. 16 17 And our first speaker is going to be Mike Channell, and he's with York County Office of Emergency Management. Mike? 18 19 MR. CHANNELL: Good evening. My name is Mike Channell. 20 I'm with the York County Office of Emergency Management. 21 Emergency Management Coordinator there and oversee the Public Safety 22 Division's program. The Public Safety Programs Division is responsible for 23 emergency planning, training and exercises, primarily dealing with Catawba Nuclear Station. 24 Emergency Management here has worked with Duke Power, 25

which I guess now we should say Duke Energy to be correct, and Catawba for many, many years. I, myself, have worked with some of the departments there since about 1993. And during that time, we have formed an excellent relationship between the folks at Catawba and the folks in local government. I would venture as far to say not only in relationship but some friendships there as well.

I think that Catawba itself has proven to not only be an asset to our community by generating power there, but I think they -- but also because they are an active neighbor in our area. They're not just there as a corporation, they're there as a neighbor as well.

I work primarily with the Emergency Planning Division there and also with Rose and Glen and Eddie with Corporate Communications. We all work very closely together dealing with plans and issues that deal with either the site or concerns that citizens may have from York County. We also conduct joint training for our EMS and hospital personnel to ensure quality emergency response, and that's done on an annual basis there at Catawba. And we're also in contact with EP and Corporate Communications almost on a daily basis, and I can say that without hesitation that they're a very dedicated team there. Any time that we call upon them, they never hesitate to answer any questions that we have or never hesitate to offer to assist us in any way.

Along those lines, Catawba has not only offered us assistance in planning for situations involving the site or involving emergencies that occur there, they have also extended their expertise and services for anything off-site dealing with radiological materials. We all know that they have a lot more expertise and experience in dealing with radiological materials than

1 we do in local government, and they have been more than courteous in 2 extending that to us. 3 We feel that Catawba and Duke Energy are just as 4 concerned about the citizens of York County as we are, as a local government. 5 And we're very confident that if an emergency situation should arise there, that 6 the emergency plans that are in place, both on-site and off-site and with the 7 coordinated efforts between local government and Catawba there, that we would be able to provide our citizens with the utmost protection in that situation. 8 9 Thank you. MR. CAMERON: Okay. Thank you very much, Mike. Next 10 11 we're going to go to some people from the Catawba Station. First of all, we're 12 going to hear from Gary Peterson, who's the Vice President at Catawba 13 Nuclear Station. Gary? 14 MR. PETERSON: Thank you very much. Good evening. My 15 name is Gary Peterson. I am the Site Vice President at Catawba Nuclear 16 Station. I've been in the nuclear power industry for nearly 31 years, the last six 17 of that at Catawba Station. My job each and every day is to ensure the safe operation of that facility. Before I begin, though, I just want to take a moment 18 19 to thank the members of the community who have taken time out of their busy 20 schedules to come and speak on our behalf of this license renewal project. 21 Catawba Station is proud to be a part of York County 22 community, and I'm here today to provide information that is part of our license 23 renewal application. Following my comments, Margot Rhode, a scientist at 24 Catawba, will discuss some of our environmental programs. Our presentation today consists of three parts: First, a short 25

background on Catawba; two, a brief description of our license renewal project; and third, a summary of the environmental report. I will go over the first of the two areas, and Margot will provide specific information on the environment section.

Catawba Station is located on Lake Wylie, which is part of the Catawba River. It produces over 2,000 megawatts of electricity, which is enough electricity to power two cities the size of Charlotte. Catawba was designed, built and is operated by Duke Energy. Catawba has five co-owners, including North and South Carolina co-ops and municipalities and, of course, Duke Energy. Catawba has provided safe, reliable and economical electricity for the Piedmont Carolinas since 1985.

And during the two decades that we have been a part of this community, our employees have worked diligently to provide a safe, reliable product, that is electricity, while protecting the environment. All of our employees are committed to this mission, as well as to serving the community that they call home.

As you can see from these slides, our employees are active volunteers in the community. For example, for 11 years, we've hosted Boy Scout encampments where our employees teach classes in electricity, crime prevention, computers, energy, electronics and communications. Over 1,000 boys have attended these events at Catawba Station. Our employees are also part of the Junior Achievement Program, partnering with local schools in the area, teaching business skills, providing tutors and mentors.

And one thing I'm particularly proud of is that each year our employees collect coats and blankets for area shelters and gather school

supplies for area schools. They also volunteer hundreds of hours of their own time each and every year to United Way agencies. Also we donated, as a Station, well over \$100,000 a year to dozens of United Way agencies.

We're involved in blood drives and annually provide over 300 units of blood. And we have hosted the Women in the Outdoors and Jake's Events and partnered with local schools to create backyard school habitats and nature trails.

Our license renewal application was submitted on June 13 of this year. The application is approximately 1,300 pages of technical and environmental information supported by 500 engineering drawings. At Catawba, we are continuously evaluating and renewing Station operations through aggressive preventive and predictive maintenance programs and equipment and technological upgrades. But our first priority is and always will be operating the Station safely while maintaining a healthy environment. After all, this is where we live and work too.

In May of 2000, Duke Energy's Oconee Nuclear Station became the second station in the United States to receive a renewed operating license. And just as we did at Oconee, we've conducted a very careful and thorough review of Catawba and its performance. This evaluation proved what we already knew, that Catawba is a safe, reliable and economic source of electricity. And based on the results of this evaluation, we know that license renewal is the right decision for our neighbors, our customers, the environment, Catawba's co-owners, as well as Duke Energy and our Duke Energy shareholders.

The reasons for applying for license renewal at this time are

straightforward. We filed a joint application with our sister station, McGuire, which allowed us to make the best use of resources and take advantage of the skills of the very experienced Oconee license renewal team. This process, the license renewal process is very extensive. We gathered and reviewed a tremendous amount of information. We will continue to work diligently with the NRC, as they need to complete their review of our submittal over the next several years. We gave careful consideration to our decision whether or not to apply for license renewal. As you know, Duke Energy has served its customers well for almost 100 years. We're always looking at new alternatives to better serve our customers. During this license renewal application process, we did look at many alternatives for generating the large amount of baseload electricity that Catawba provides. We looked at conventional fossil generation, wind, solar and photocells. But when compared to the amount of electricity generated by Catawba, these alternatives were not selected because of environmental impacts, land use requirements, inadequate electricity output and cost. Using existing data and input from a variety of subject matter experts, we have concluded that there would be no significant environmental impact as a result of renewing Catawba's license. As I close, I just want to thank the community for the support we've received for the last 15 years of operation -- 16 years, and we look forward to many more years. Thank you. MR. CAMERON: Next we will hear from Margot Rott, who is a scientist at the Catawba Nuclear Station. Margot?

MS. ROTT: Thanks. Good evening. My name is Margot

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

Rott, and like he said, I'm a scientist at Catawba Nuclear Station. I have a degree in biology, and I've been at Catawba for a little over 20 years. I've worked in the areas of chemistry, technical training and environmental. More than 75 years ago, Duke Power became one of the nation's first electric generating facilities to establish its own environmental program. Today, we have over 150 scientists, engineers, biologists and technicians, and it's our job to monitor and protect the environment. The initial environmental review for Catawba was completed over 25 years ago. This review established the ground work for continuous considered relevant issues. Catawba's intake and discharge structures and aquatic ecology. effect on the Lake or River.

environmental monitoring, which is performed at the Station every day. As part of this license renewal process, we reviewed environmental monitoring data collected over Catawba's entire operating history. We consulted with environmental regulatory and resource agencies to make sure we fully As part of our environmental report, we've reviewed 13 major environmental areas, which are grouped into four categories: water, plants and animals, air quality and people. We'll take a look at these areas individually starting with water. Duke Energy has conducted water testing on Lake Wylie since the early 1970s. The areas we study include water quality, water flow at Our evaluation of historical data indicates no changes to Lake Wylie's aquatic resources as a result of Catawba's operation. Using scientific data, we concluded that our continued operation would not have an adverse The second category we evaluated is plants and animals. As **NEAL R. GROSS** COURT REPORTERS AND TRANSCRIBERS 1323 RHODE ISLAND AVE., N.W. WASHINGTON, D.C. 20005-3701 (202) 234-4433

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

part of our study, Duke Energy worked with Dr. L.L. Gaddy, a well-known environmental scientist, to perform a study of threatened and endangered species at the Catawba site. Results of the study indicate that there were no state or federally recognized threatened or endangered species identified; in fact, Catawba has a thriving population of quail, beaver, bobcats, Canada geese, osprey, deer and many other wildlife species. Catawba has many ongoing environmental initiatives managed in cooperation with the South Carolina Department of Natural Resources, the South Carolina Wildlife Federation and the Wild Turkey Federation. The Catawba site is in the final stages of becoming WAIT-certified by the South Carolina Wildlife Federation, and WAIT, W-A-I-T, stands for Wildlife and Industry Together. Catawba hosts a butterfly garden and various other wildlife areas. Based on our review of operating history and a look at our continued operation, we conclude that license renewal will not adversely impact plants and animals. The third environmental category we studied is air quality. Nuclear power provides about 50 percent of Duke Energy's electric generation needs in the Piedmont Carolinas. By design, nuclear power is clean air energy source. Data shows Catawba's operation has not adversely impacted the region's air quality, and there are no plans associated with license renewal that would alter the air quality. And I'll conclude tonight by discussing the people who live in

the communities around our Station. Catawba has a national reputation as a

well-run Station. We are committed every day to protecting the health and

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

1 safety of the public and our employees. This commitment will continue for as 2 long as we're a part of this community. In addition to being safely operated, Catawba has provided 3 4 many benefits for the community. For example, Duke Energy has contributed 5 millions of dollars in property taxes to York County. We have over 1,100 6 employees helping to maintain a strong economy in this area. Our annual 7 payroll of over \$70 million helps support local businesses and industry. And as 8 Gary mentioned earlier, our employees spend hundreds of hours each year 9 volunteering for community, school, civic and church programs. 10 And on a personal note, my husband and I live in the Lake 11 Wylie area. We're about two miles from the Station. We love this area. We 12 swim and boat in Lake Wylie, we enjoy bicycling all over this area. We 13 consider it home, which is why I have a personal interest in this project, as well 14 as a professional one. Thank you. 15 MR. CAMERON: Okay. Thank you very much, Margot. Our next three speakers are going to Angela Viney, Glen Jocoy, and, Glen, I hope 16 17 I --MR. JOCOY: Gregg. That's fine. 18 19 MR. CAMERON: Okay. And Janet Zeller. And I guess I'd 20 like Angela Viney from South Carolina Wildlife Federation to come up. 21 MS. VINEY: Thank you. Good evening, everyone. My name 22 is Angela Viney. I'm the Executive Director of the South Carolina Wildlife 23 Federation. I came to this position in July of 1997 and have been working with 24 different units of Duke Power -- Duke Energy since that time in conservation, 25 natural resources and environmental education projects.

\_\_\_

The South Carolina Wildlife Federation has as its mission to advocate environmental stewardship by promoting wildlife habitat enhancement and natural resources conservation for today and tomorrow. We work with many partners in this effort, and one of the primary ways in which we fulfill our mission is through education.

This evening, I would like to share with you my knowledge of the environmental stewardship of the Catawba Nuclear Station by way of their partnership with the South Carolina Wildlife Federation and our educational programs.

The South Carolina Wildlife Federation is the state affiliate of the National Wildlife Federation and therefore works with our national office in promoting many programs. One of those is the Backyard Wildlife Habitat Program. We are proud of the fact that South Carolina has more certified backyard wildlife habitats than any other state in the country.

Since we're the leaders in this Program, we were asked by our National Wildlife Federation office to pilot a new program in South Carolina, the Habitat Steward Training Program. The Program allows us to train interested individuals to prepare them to be mentors in their community in creating wildlife habitats. Through this Program, we've been able to place mentors at schools to assist in creating schoolyard wildlife habitats -- outdoor classrooms used in different curriculum area.

One of the other offshoots of the Backyard Wildlife Habitat
Program is the WAIT Program that Margot mentioned. And, in fact, Duke
Power is one of the founding partners. Having worked to protect and enhance
wildlife habitat at the World of Energy in Seneca in 1996, the South Carolina

Wildlife Federation, the South Carolina Department of Natural Resources and the National Wild Turkey Federation worked with Duke Power at that site and was so impressed with the outcome that this new wildlife habitat education program was created. WAIT is designed to encourage corporate landowners to integrate wildlife habitat needs into corporate land management decisions. There are now 20 industrial sites in South Carolina certified as WAIT sites and another 30 plus working on their certification. The certification requires a threeto five-year plan, a community partner and an educational component. The Catawba Nuclear Station is our most recent WAIT site, and they've gone over and above the standard requirements in creating their WAIT site. They've hosted one of our habitat steward classes in 2000 at Energy Quest. In addition, they initiated partnerships with three schools in the area. York Junior High School, Goldhill Elementary, and Goldhill Middle School are being assisted in the creation of their schoolyard habitats, their outdoor classrooms, by the staff of Catawba Nuclear Station. There are numerous wildlife habitat management and protection initiatives at Catawba Nuclear Station to include osprey towers. To date, four have been installed to encourage an osprey nest on-site. Wood duck boxes have been installed in the standby nuclear service water pond. Wildlife food plots have been planted, wetlands within the site boundary have been identified and signs posted. Selective moving is in place to provide meadows for wildlife

NEAL R. GROSS
COURT REPORTERS AND TRANSCRIBERS
1323 RHODE ISLAND AVE., N.W.
WASHINGTON, D.C. 20005-3701

information on butterfly gardens and native wild flowers. An educational nature

Educational brochures are available at the visitors center with

habitat.

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

1 trail is available with a brochure to identify plants, trees and vines on the trail. 2 In addition to the invaluable work on the protection and 3 enhancement of wildlife habitat, the Catawba Nuclear Station also works to 4 enhance the environment through such efforts as utilizing a Reduce, Reuse, 5 Recycle Program to reduce the amount of waste generated and then to reuse, 6 when possible, or recycle, as necessary. 7 A waste minimization program is in place, which has changed the site from a large quantity generator to a small quantity generator of 8 9 hazardous waste. An extensive chemical evaluation and approval process 10 exists to ensure the most environmentally friendly products are selected for 11 use. 12 In conjunction with Catawba Nuclear Station efforts to partner 13 with schools, they have a program underway to supply every elementary and 14 middle school near Catawba Nuclear Site, within a ten-mile radius, with 15 environmental workshop backpacks that will include kits for environmental and 16 wildlife monitoring. 17 In all of these conversation education programs, the Catawba Nuclear Station has developed and sustained partnerships with the South 18 19 Carolina Department of Natural Resources, the South Carolina Wildlife 20 Federation, the National Wild Turkey Federation, the Stowe Botanical Garden, 21 the Piedmont Council of the Boy Scouts of America and the schools in the 22 area, specifically the ones I mentioned earlier. 23 The Catawba Nuclear Station is taking an active role in 24 teaching and advocating land management practices, which enhance habitats

and sustain wildlife in their corner of the world. They are also setting the

1	example for others to follow. And we at South Carolina Wildlife Federation are
2	proud to be partners with them in these efforts and applaud them. Thank you.
3	MR. CAMERON: Thank you, Angela. Let's go to Gregg
4	Jocoy.
5	MR. JOCOY: Thank you.
6	MR. CAMERON: You're welcome.
7	MR. JOCOY: I trust you'll make me aware of my five-minute
8	time frame.
9	MR. CAMERON: I'll do that.
10	MR. JOCOY: Great. Thank you very much.
11	MR. CAMERON: I'll do that. And it's, you know
12	MR. JOCOY: So if you just laugh at me.
13	MR. CAMERON: We won't we won't do that.
14	MR. JOCOY: I want to start off by saying I have absolutely
15	nothing written, so I don't have an opportunity to give you a canned speech.
16	All I can do is try my best to speak from the heart, okay?
17	If you go up to Winston-Salem, the folks up there will tell you
18	that the tobacco industry is a great corporate citizen, okay? So why are we
19	surprised that Duke Power stands here today and says, "We're a great
20	corporate citizen," okay? If you go to a community that has a hazardous waste
21	dump, I can assure you that the people who run that hazardous waste dump
22	have got people involved in Boy Scout and Girl Scouts and other activities of
23	this sort. They do so specifically to persuade the general public that they are
24	good corporate citizens. But none of this is relevant.
25	The question that we have to ask the NRC to address is what

4 5 6

7 8

9 10

11

12

13

14

15 16

17

18 19

20

21

22

23

24 25

are the environmental impacts of extending this license? The guestion of whether or not the Boy Scouts will have leadership from Duke Energy is irrelevant; it does not matter. The question of whether there will be more ducks on that pond may have -- that may have some relevance, but Duke Energy is no more responsible for those ducks being there than I am. God put those ducks there; Duke Power did not.

The questions that we have to ask are what is the environmental impact of keeping that Plant open for 20 more years? Now, truth of the matter is I'm not a scientist. I graduated from high school. I flunked out of college. I don't have the kind of background that would allow me to stand up here and tell you what the environmental impacts of extending this license would be. There are other people better than I who can give you that information. Some of them are here. Some of them support Duke Energy, some of them oppose this license extension. I would encourage you to listen with an open mind to those people who have a position different than Duke Energy's.

Now, I realize that there is a subject that none of us really care to address, but it must be addressed. All right. Well, first of all, let me say this: I'm glad you're a neighbor. I live in Fort Mill, I live close to that power plant, but I got to tell you, telling me, "I live there, why would I want to poop in my own backyard," cuts no mustard with me.

Once again, I've heard that argument every time I've ever been to a hearing or discussion about these kinds of things. Yes, it's true we run a plant out here like the plant that burned hazardous waste out in the countryside in Rock Hill, and the people who ran that plant said, "Hey, we live

in this neighborhood too," but the paint was peeling off a church across the street from the doggone thing. So that, once again, me, personally, that cuts no mustard.

The question that, as I say, is kind of an undercurrent, and I wish it were not something that we have to even consider, is the question of

I wish it were not something that we have to even consider, is the question of a terrorist threat to that power plant and the impact that would come from an accident or an attack on that power plant, and before you tell me that that is totally unreasonable, won't happen and so on like that, remember that Anwar Sadat was murdered by his own staff as he stood in front of an audience. They drove by in the truck and gunned him down. An Air Egypt airline pilot crashed his airplane, a trained airline pilot crashed his airplane. Timothy McVeigh worked for the U.S. military. Thank God he didn't have access to or use the military weaponry that he had available to him when he was in the military or things might have been much worse than they were.

Even if you could document to your own satisfaction that no accident and no terrorist act at the Catawba Power Plant could possibly release nuclear material from that plant, you couldn't satisfy me. Thank you.

MR. CAMERON: Okay. Thank you. Thank you, Gregg.

Next we're going to go to Janet Zeller, who is the Executive Director of the Blue

Ridge Environmental Defense League. Janet?

MS. ZELLER: Thank you, Chip. I'd like to express appreciation to the NRC for holding this hearing, and I'm very glad to be here today. I bring you greetings from Katherine Mitchell who heads our Charlotte office. She's ill and could not attend, but we do have members in York and Mecklenburg County and in the surrounding counties and transport corridor

1 counties and offices -- five offices, actually. The nearest is Charlotte, and we 2 have an office in Aiken, South Carolina. 3 Because the U.S. Nuclear Regulatory Commission web site 4 is down and because there are significant documents that we are unable to 5 access at this time, the Blue Ridge Environmental Defense League requests 6 an extension of the comment period for our written comments and elongation 7 as is paralleled by the lack of information, available information for the entire 8 process. 9 My favorite American poet, Theodore Redkey, wrote, "In a dark time, the eye begins to see." And in this dark time, Americans are much 10 11 more aware of not only the possibility but the inevitability of terrorist assaults. 12 And I agree with Mr. Jocoy that the Nuclear Regulatory Commission can't 13 simply go on with business as usual as if the terrorist attacks on September 11 14 and the subsequent attacks are not occurring. 15 Typically, the NRC evaluates terrorist attacks as improbable, 16 unlikely, perhaps possible, but the inevitability of a terrorist attack on a nuclear 17 power station or a nuclear shipment must be factored to any environmental impact statement that comes out of this license extension process. 18 19 Our organization in the fall of 1994 and the fall of 1995 20 successfully tracked shipments of high-level nuclear research reactor waste 21 coming from European countries, across the Atlantic, into the Sunny Point 22 military ocean terminal in eastern North Carolina and all the way across South 23 Carolina to Aiken -- or to the Savannah River site. It took a \$100 used, very 24 good, telescope. It took a \$100 airplane that we hired. 25 And so our purposes were not terrorism-related.

purposes were to prove that if a grassroots environmental organization can track nuclear waste shipments, that sophisticated or even less sophisticated terrorists than we've seen operating lately can do the same. Our second purpose was to alert people living along the transport routes that the shipments were coming through, so that they could evacuate, because these were coming through on the train, and people were living right there near the shipments.

So it is a new world now, and NRC cannot simply blow this off and indicate that there is an improbability of terrorist attack A or terrorist attack B.

Our written comments and other speakers from our organization tonight will be discussing some of the other issues. Some of our major concerns include the partitioning and the fragmentation of this process, which we believe is unlawful, that it is a violation of the National Environmental Policy Act. We also believe that energy alternatives have not been adequately addressed by the Duke license extension application. And the NRC must do a much better job than Duke did of evaluating realistic alternatives to a 19-year license extension of the Catawba and McGuire reactors.

We are also wanting the NRC to evaluate some liability issues. Thanks to our friend, Mary Olson, from Nuclear Information and Resource Service, we were alerted that Duke recently filed with the Federal Energy Regulatory Commission to set up a limited liability corporation, thereby relieving them from the day-to-day operations liability at their nuclear power stations. We want the socioeconomic impacts of the potential for this new limited liability corporation to be factored into a complete EIS.

And I will stop there, and thank you very much.

1 MR. CAMERON: Okay. Thank you, Janet. Our next three 2 speakers are going to be Dr. Lewis Patrie, Mary Olson and Lou Zeller. And I'd 3 like to ask Dr. Patrie, who is with the Western North Carolina Physicians for 4 Social Responsibility. 5 DR. PATRIE: Thank you. MR. CAMERON: You're welcome. 6 7 DR. PATRIE: Thank you very much. Consideration of the 8 use of MOX, that is fuel which contains plutonium derived from dismantled 9 nuclear weapons, should be an integral part of any consideration about license extensions. With the projected use of MOX on a trial basis within the next two 10 11 years and regular use by 2007, it is an important factor which should have been 12 identified in the license renewal applications. 13 The characteristics of MOX are significantly different from 14 that of currently used uranium fuel. These characteristics should be taken into 15 consideration along with the age of reactors and the reactors' unique features. Some include these reactors' limited shielding, the unique characteristics of 16 17 these reactors' cooling systems and the management of hydrogen gas released during operations. 18 19 But even more important and urgent at this time is the issue 20 of security, which has become much more obvious since the terrorist attacks 21 last month. It is apparent that our nation's 100 plus nuclear reactors are 22 vulnerable to attack, which could come by way of air, land or water or even 23 within the facilities themselves. The results of such an attack at Catawba could 24 create a disaster of unimaginable magnitude, far greater than that experienced 25 September 11 in the Washington, D.C. area and New York.

There would be immediate deaths and so many seriously injured and burned people that even our nation's entire medical facilities could not cope with the casualties. We could anticipate that a breach of the core of either Catawba reactor would result in Charlotte and its vicinity for many square miles becoming uninhabitable for many years.

People would be evacuating the area in panic, seeking safety.

Winds would determine the disposition of radioactive fallout, which would extend the uninhabitable areas. There would be major increases in cancers and birth defects, which would continue over several decades. Needless to say, the economy and our way of life would be devastated.

Taking the possibility of future terrorism into consideration, it should be recognized that nuclear power reactors pose an unacceptable threat to the security of the United States. Recent tests have shown commercial reactors to be extremely vulnerable to attack by even single terrorists. Reactors are not designed to withstand penetration by large aircraft, truck bombs or water-borne attack. And no testing has been conducted for such events.

As part of licensing renewals, Duke Energy should be required to demonstrate changes in design in such a manner as to protect Catawba's structures against foreseeable terrorist threats that might result in a breach of reactor containment, core damage and/or damage to irradiated nuclear fuel. Enhanced physical security features and increased security force capabilities would appear to be mandatory. Furthermore, all permanent and temporary radioactive storage, disposal treatment and transfer sites should meet strengthened standards to protect against attacks that could have

disastrous consequences.

2.0

Potassium iodide should be stockpiled and made available for children and pregnant women residing within a minimum of 50 miles around nuclear reactors. While it only protects against one form of cancer, the Nuclear Regulatory Commission has approved, with conditions, this as a preventive measure to be used following radiation exposure. In the Chernobyl-affected areas, it appears that thousands of children were spared thyroid cancer in Poland where potassium iodide was available following that 1986 reactor explosion and fire, compared with large numbers of children who developed those diseases in the Ukraine, in Belaruse and Western Russia where potassium iodide was not available.

Evacuation plans for affected communities should be carried out to reflect the actual conditions which might follow a terrorist attack at either Catawba facility, and plans for relocating large numbers of refugees would also need to be incorporated into such planning. Although I understand there may be reluctance to consider the uncertainty of terrorism in the scoping hearing, Physicians for Social Responsibility of Western North Carolina points out the economy of prevention of adversity as compared with the extravagance of treatment or containment after an adverse situation arises. In the instance of terrorism, the absence of prevention may well lead to disaster.

MR. CAMERON: Okay. Thank you, Dr. Patrie. I'd like Mary
Olson from Nuclear Information and Resource Service Southeast to come up.
Mary?

MS. OLSON: Thank you. Thank you to the NRC for holding this meeting tonight. I am Mary Olson with Nuclear Information and Resource

Service. We have a southeastern office, which is based in Asheville, North Carolina. I've been there about a year, and I'm very pleased to be here in North Carolina.

We, as mentioned earlier, have filed a motion to intervene on the licensing process of both Catawba and McGuire reactors. And if anybody's interested in that, I have copies of the petition, because I'm not going to particularly go into that tonight. I will be filing written scoping comments, and I'd like to support Janet Zeller's call for an extension on the comment period for precisely the same reason. I'm very dependent on the data and documents on the web site. They're not available, and the ways in which we have to get those documents are a burden that will not fit in the current time frames allowed.

like the aging of these reactors, impacts on the Catawba River, impacts on endangered species and microbial impacts. But the main reason that we joined this intervention was to make it clear that it's completely inappropriate for Duke to pursue a license renewal on these reactors, which are under contract with the Department of Energy, to use plutonium fuel. Indeed, the contract says that they will close the reactors as the only way out of being a mission facility, and I would love it if somebody would provide me with documentation that that's wrong.

So, therefore, it's either going to be MOX in these reactors or there's no need to extend the license on a closed facility. Therefore, why are we not talking about the impact of plutonium fuel during the license renewal period? It changes everything from stem to stern, and you know it. You know it, you know it, you know it, we know it. Why are we not talking about it? Why

are we going to waste all our time either allowing you to foreclose issues before plutonium is a consideration or forcing us to bring them all back up again? Litigation twice is definitely a violation of NEPA. So all of those issues cut to the question of acceptable risk, the types of concerns I raised in terms of aging. And I'd like to, first, before I go on, thank the people who work for Duke Power, because I acknowledge that

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

25

you do your jobs, and that's important. We'd have a real mess on our hands

if you didn't do your jobs. However, the world has changed forever, I believe.

The world is a different world than when you were hired into these jobs. And

that can't be overlooked. The previous speakers have touched on this issue.

I can't go home tonight without bringing it up too.

This renewal process should be on hold. There should be no further action. The web site is down for a reason, a real reason. Why are these processes not on hold? There's been a directive that all of the license bases will have to be examined in the light of September 11, 2001. If that is the case, then why is this process not on hold?

The International Atomic Energy Agency has acknowledged that no reactor in the world could withstand a jumbo jet direct hit. How many times have I come into the Charlotte Airport on, I think it's U.S. Air that comes out of Augusta, uses McGuire as a siting to the damned airport. How many times I have said to them, "Do you know we just went over a reactor. I could tell the makes of the cars." And they smile. It's okay until now. We're in a new world. It's not okay.

So as it's not okay, we have to also factor the MOX issue into how not okay it is. We're talking about putting weapons-grade plutonium in a

form that can be easily recovered in a chemical process on the road to these facilities, stored at these facilities. We're talking about doubling, doubling if it's a full core, and I've heard you guys talk about a full core, so we'll talk about 40 percent, if you want to talk about 40 percent. But, whatever, that percentage of the core doubles the health impacts. These are my tax dollars, these are my neighbors, these are my friends. Why are we talking about doubling the possible impacts of an attack on these sites or an accident at these sites with our tax dollars?

Duke, wake up, get it straight, be a good neighbor, cancel MOX. Thankfully, thankfully, how I can say anything thankful about those damn people flying those damn planes into that damn building. But, thankfully, they didn't pick Indian Point, because you could multiply the casualties by a thousand or more if they had. Three reactors right across the River on the Hudson. Okay.

Table all that for a minute, go back to the world as we think we want it to be, just plain old humdrum license renewal. Well, even the NRC admits that with no accident, no problem, just plain old routine activities, 12 access deaths will occur from 20 years of reactor operation at any reactor in the United States, which is a ludicrous proposition to suggest that such a thing is totally linear and totally quantifiable.

But I'll take the bait. Okay, 12 deaths from extending Catawba's license. Well, guess what? There's 100 reactors looking for license extensions. That's 1,200 deaths from license extension, according to NRC. Not me. I'd multiply it by at least ten. If I had a little more time and an assistant, I'd back that multiplication up with numbers for you. I could probably

hire someone if I had a little more money.

Okay. So that takes us back to what I started with: acceptable end risk. NRC knows that Mary Olson has never accepted the same definition as acceptable. I can't get up before you without reminding you that you should be regulating to protect children. The standard man who has a certain age, a certain height, a certain weight -- I married one; he's pretty good -- that's five minutes, I'll wrap it up pretty quick here -- that standard man, he can't reproduce. How are you going to have your future generations of Boy Scouts to have your little backyard eco-habitats with if you don't regulate to protect children? So that 1,200 deaths, that's standard men, okay? How many is it really?

And then when we come to risk, I think if you go home and you really look at your kids and your grandkids and you pay attention to the news and you put the dots together, you have to understand that the question of risk has irrevocably changed, irrevocably. France is putting anti-aircraft missiles, whatever you call them, guns, near some of their nuclear facilities. French people who are touted as the number one nuclear nation in the world are out in the streets in thousands protesting nuclear facilities. The world has changed.

So what are the alternatives? There are alternatives. Get it straight, guys. There are alternatives, because we're not talking about today's jobs. We're talking about jobs that start, what, 20 years from now? Right. Well, guess what? All of the alternatives have jobs too. And guess what? Duke could provide them. So get it straight. Offshore wind is a great potential. If there's a single order for 500 megawatts of solar, it will be down below

1 natural gas in its kilowatt hour charge. Just make one big order for solar, and 2 it's going to be affordable. 3 Methane, global warming, you know about global warming; 4 you've got that wrapped down. Well, go to all those municipal sewage facilities 5 are start making power with that methane. Fuel cells, all kinds of off-grid 6 alternatives. You all are installing diesel generators all over the place. 7 So the last point I want to make is that in this EIS, you've got 8 to look ahead, and you've got to figure that sometime in the next 20 years we're 9 not going to have a regulated energy market in the Southeast. And you've got 10 to look at Duke Power's behavior in the West, and you've got to ask yourself 11 what's going to happen to the municipalities and the co-ops when Duke is 12 unregulated, and they have to sell at their bond rate? And you've got to look 13 at what kind of a white elephant Catawba's going to be for those communities. 14 And you've got to put that in there, because otherwise you're fooling yourself. 15 So if you want to talk about a terrorist attack, just look at that one. Okay. 16 So back to the acceptable and the risk. One thousand two 17 hundred NRC-approved deaths is too many, and one Chernobyl is too many. The question is are we enough to make some new decisions. 18 19 MR. CAMERON: Okay. Thank you, Mary. Lou, you're next 20 up. Do you want to go from over there and use this microphone or are you 21 going to bring it up? This is Lou Zeller, Blue Ridge Environmental Defense 22 League. 23 MR. ZELLER: Thank you, Chip. I'd like to comment here 24 tonight on the lack or the inadequate analysis done by Duke Energy in its 25 submission for the license renewal at Catawba, the inadequate job done in

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

25

analyzing alternative sources which could be used to generate the power, which is now provided by the Catawba Nuclear Station. I brought this map here because we are engaged in our wind energy education project, which we are initiating in western North Carolina.

From our initial investigations into the potential for just one alternative source of energy, and that would be wind power, we have found the following: That the United States Department of Energy has targeted electric generation use by -- generated by wind by the year 2020 to total five percent of U.S. electric use by that year. They have also targeted to increase the number of states generating more than 20 megawatts of wind powered electric power from eight states to 16 states by the year 2005.

Now, worldwide, in 1999 data, there were 10,000 megawatts of wind power around the world. Two thousand five hundred megawatts of that was generated in the United States. In the single year of 1999, there were 700 megawatts of electric generation by wind added to the total in the United States alone. Now, the 2,500 megawatts in that year of wind power represents only 0.1 percent, one-tenth of one percent, of electric use in the United States, so to get to five percent, we would increase that by about a factor of 50, bringing us up to around 125,000 megawatts of electricity by that year.

A five percent total sounds rather meager compared to Denmark, which generates ten percent of its electricity presently with wind power. But even with the five percent goal by 2020, we would be generating 125,000 megawatts of electricity, which would take a huge chunk out of the current generation of electricity by all 103 nuclear power plants in the United States.

1	
2	
3	
4	
5	
6	
7	
8	
9	
10	
11	
12	
13	
14	
15	
16	
17	
18	
19	
20	
21	
22	
23	

25

What would this mean to the economy of the United States? It would mean \$60 billion of new investment, which would be \$8 billion per year by the year 2020. It would mean \$1.2 billion income to farmers and rural citizens with land holdings who would be receiving rent from the placement of large wind generators, such as the one in lowa, located in the upper right-hand corner, and the generator right here in Northeastern -- or southwestern Pennsylvania in the Northeastern part of the United States.

It would also have other benefits. The carbon savings in metric tons would amount to 35 million tons per year by the close of the second decade of the 21st century. It would also result in 80,000 permanent jobs across the United States from five percent wind power electric generation.

Now, wind energy resource atlas shows that we could generate enough wind electricity to exceed the current electric consumption in the United States. This map -- this wind map, which is here, was generated in 1981. Certainly, that map should be a part of the factoring that Duke Energy should be doing before it completes the submissions on its application for the Catawba Nuclear Reactor.

The electric power which is generated is competitive currently with fossil fuel at around four to six cents per kilowatt hour. And the experts estimate that by the year 2020, with improvements in generating capacity and generators, that this will drop to two cents per kilowatt hour. Those of you who have noticed the map here, it shows that the white area is relatively low in potential for wind energy generation.

We might notice that in the State of Nebraska there is relatively high generation. It's fair to point out that the State of Nebraska

imports most of its electricity from out of state, from coal-fired generating units. This is a trend which could be reversed so that Nebraska, at least, would be generating its own power through the use of wind, reserving the existing coal power or other sorts of renewable energies generated outside of that state so that Nebraska would no longer have to import power.

Also, please note that here along the coastline some of the most fruitful areas for wind energy development are along the coastlines or even off the coast. Scandinavian countries have done this and are doing it now at a cost-competitive basis around the five to six percent per kilowatt hour range, and this obviates some of the impacts which some people might point out, who wants to have a wind generator in the Blue Ridge Mountains? But we think that some people would think that they are quite beautiful. But in any case, the State of South Carolina has a huge wind potential located offshore, out of sight of some of the beautiful beaches. Thank you.

MR. CAMERON: Okay. Thank you, Lou. Our next three speakers are going to be Glenn Carroll, Don Moniak and Sherry Lorenz. No? Okay. Well, you can decide when we're done with Don Moniak, because we're going to go to Glenn Carroll first, Georgians Against Nuclear Energy. Glenn?

MS. CARROLL: Thank you, Chip. And my name is Glenn Carroll, and I'm Coordinator of Georgians Against Nuclear Energy. We're conducting an intervention now before the Nuclear Regulatory Commission about the fuel factory, the MOX fuel factory that's been proposed for Savannah River Site.

I've been pretty buried in that, and I came out tonight, because when you consider MOX it inevitably does lead to Catawba and

McGuire, and I've been alarmed at what I've learned about the facilities, only really because of our interest in MOX and our concern about plutonium traveling through Georgia and a very, very messy process right next to the river that makes the border between South Carolina and Georgia.

There are some things about Catawba and McGuire that are pretty obvious. The containment system, the freeze-thaw cycle from the ice condenser technology, which is used is causing warpage so that doors and valves do not open properly, which creates safety conditions. Because of the September 11 events, this has had a direct effect on the way we consider the MOX fuel factory, and we did analysis two weeks ago about how thick the walls would need to be on the factory, on the fuel factory, to withstand a fully fueled jetliner impact. And the figure would have to be greater than four and a half feet, which is the penetrating power of a jetliner.

Unfortunately, what we have here, considering relicensing, we don't have the luxury of altering the design of these facilities to the extent that we would be able to change the containment. It is at least 18 inches too thin to withstand a jetliner impact.

Now, I've been buried in this intervention. You would not believe how stressful, how strenuous it is to litigate. I am an artist. I've been a volunteer for 15 years. Fortunately, my group did raise money and is paying me to lead our intervention. Now, I'm a layperson. My question was how can this relicensing -- I felt like this relicensing was premature, because the license expires in, what, 13 years? So it seems premature. Let's see a little bit more successful operating before we talk about extending it, so that from now the Plant would operate longer than it's already operated. That seems ridiculous

to me.

2.0

And I thought how can we evaluate MOX issues in this facility, because we haven't even finished looking at MOX. We haven't even gotten started with MOX. And now I find out, I did not know until tonight, that we're not even considering putting MOX in this. Now, that's why I'm here, because I was concerned about putting MOX in these particular reactors, of all the reactors in the country to put this plutonium fuel.

I'm an artist, an even I understand that the reactivity of plutonium fuel is vastly different than the reactivity of uranium fuel, that the reaction time is seriously, seriously less, very much less than the reaction time we have with uranium fuel. And it was that lack of reaction time with uranium fuel that caused Chernobyl. And we're talking about operating with, I seem to recall a figure of three percent of the reaction time that we're used to having.

But we're not even considering that. You all? And I'm sorry, I'm fairly cynical. I know what we're here for. We're doing scoping for an EIS hearing. Well, we've already done that with MOX. You know what? We shouldn't even be in a MOX licensing proceeding, because the rules say that you do your EIS -- the rules say -- I'm sorry, I get confused. Anyway, drop that point. That's just wrong.

I learned today that the airport in Charlotte is near the McGuire Plant. So how are they going to know when the plane is acting funny? They won't have time to deal with it. Are there residents of Rock Hill here tonight that don't work for Duke and don't work for the NRC? Because what I thought is, okay, I don't really -- the EIS hearing -- the scoping for the EIS for MOX fuel looks pretty pre-set. It doesn't really respond. I went to all the

hearings, and I heard all the comments. I didn't respond to them.

2.0

So I thought what I'd like to say tonight, more than hold out the hope after 15 years of doing this, that the EIS will actually respond to the things I will say tonight, because I thought I'd like to talk to the people that are involved and to contemplate what would make us hooked on Catawba? What would make Catawba attractive? And I come down to the financial impact it has on individuals who are employed.

This is a prosperous town, and I think that Duke Power's presence here has fostered that. I've enjoyed prospering from being an environmentalist this year, and we've run out of money, and so I know how hard that is to face not being able to pay the bills when you've been able to for a while.

And I thought that even if the community who has so far been comfortable with Catawba and McGuire, has felt like they've prospered, maybe they started to think that September 11 changed things and it was too hard to think about. And it really is creepy. I mean we have a terrorism contention in already about the MOX fuel factory, and it is creepy. You get dirty, you feel dirty when you think what would a terrorist do, what would a terrorist think? I mean we're normal, healthy people. We don't want to think thoughts like that. You don't want to think about what serial killers think before they start their thing. So maybe you don't think about it. Or maybe you start to and you just don't see what you can do.

And so I offer that there's a transmission grids, that there are technologies that are benign that are ready to go, and that then the activity the employees for Duke, the employees for the Nuclear Regulatory Commission

they begin to think how do we take care of it? There's all this fuel here. How do we take care of it? How do we protect it? And all the energy goes into there, and there are jobs. But how do we get, and this I can't answer, how do we get our society to say, "We'll pay you to do this. We'll pay you to handle the waste, we'll pay you to handle the security."

We have another economic problem, and maybe the EIS surprises me. Analyze it. Because there's a requirement to do cost/benefit analysis and comparison. Surprise me. Put in the alternative energies. I know one of the complicating factors is we don't know what to do about free fuel. It does not -- our economic model cannot handle free fuel. Duke is in the fuel business. It was a scandal, Duke's face in the fuel business in the California energy crisis. Who's on your Board, who's on Duke's Board? Are they with Exxon? Are they with United Enrichment Services? I bet you.

So I think all our science, all our technology needs to go to dealing with the materials. They're there, they're a hazard, they're vulnerable. They're in water that if we lose the water, we're sunk. They're in fragile containment domes. If we lose the containment, we're sunk. It needs to be all hands on deck to deal with it. Thank you. God help us all. We've been lucky.

MR. CAMERON: Thank you, Glenn. Next we're going to hear Don Moniak, from Blue Ridge Environmental Defense League.

MR. MONIAK: Hello. My name is Don Moniak. I'm the Community Organizer at Blue Ridge Environmental Defense League. I work in the Aiken, South Carolina office. We're about 25 miles -- actually, 20 miles from downtown Savannah River Site where the F&H Canyons are and this 36 million gallons of highly, intensely radioactive liquid waste that was supposed

to be solidified by about this year, and they solidified about eight percent of it so far. But they're getting there.

Here's a quote: "lodine 131, 132, 134, 135 will be found after reactor accidents and following the destruction of a nuclear reactor by hostile forces. Radioactive iodine is a normal fission product found in reactor fuel rods. It is released by rupturing the reactor core and its containment vessels. Primary toxicity is to the thyroid gland." And this is from the first edition of "Medical Management of Radiological Casualties," which I've been handing out to emergency responders, stopping at emergency rooms at hospitals. I've handed out about 95 of these now, and I just ordered another 100. It's from the Military Medical Operations Office, Armed Forces Radiobiology Research Institute, Bethesda, Maryland. Anybody wants the web address to order some, I'll give it to you afterwards. First edition, December 1999.

Now, these people don't fool around. These are people who have to make sure the troops can get up and fight after they've been dosed. And they admit that the psychological impacts of high doses of radiation or even moderate doses is really extreme, even on a hardened force of troops.

So this has to -- the consequences have to be addressed. If the Pentagon considers it to be a possibility, primarily overseas but also here, if it's a possibility, it has to be addressed. The consequences have to be addressed so that we know what the consequences are. It's that simple. And that has to be addressed as part of the generic environmental impact statement possibly because it wasn't. So there's Item Number 93 for the list.

Okay. As far as alternatives go, we heard earlier from Duke Energy that they evaluated other sources of energy. However, what they didn't tell you is that in the Nuclear Regulatory Guide 1437, Volume 1, Section 0.81, the NRC has determined that a reasonable set of alternatives should be limited to analysis of single, discrete electric generation sources and only electric generation sources that are technically feasible and commercially viable. So the alternatives that were not considered as reasonable power, some of which Duke Energy earlier claimed twice today, twice at McGuire that they did analyze and never really did, is wind, photovoltaic cells, solar thermal power, hydroelectric generation, geothermal, wood waste, municipal solid waste, energy crops, delayed retirement of non-nuclear units, imported power, conservation and combination of alternatives. The only thing they did analyze was for replacement power alternatives is your basic centralized plants, such as conventional coal-fired, oiland gas-fired, gas-fired only, combined cycle, advanced light water nuclear reactor, even though that's not necessarily technically feasible at this time. That remains to be seen. I would wager that the advances that have occurred in wind energy, although this isn't the best part of the world for it. But remember we are one country united, at least that's what I hear lately, except when you come to one of these meetings and the people in the area make snide little remarks that it's a bunch of visitors from outside the area who don't understand Duke.

Or that down in Augusta, the Mayor of Augusta said that I was a plant, that I was planted there in Aiken, South Carolina to fight the plutonium fuel factory, and I did move there, but I didn't have to live in Aiken. I could have lived anywhere in South Carolina. I had my choices. Aiken's a nice town. It was a real nice town too long before SRS ever showed up.

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

16

17

18

19

20

21

22

23

24

25

Today, the Blue Ridge Environmental Defense League filed a motion to dismiss this proceeding, at least for a few years. It makes perfect sense. For starters, it appears that Duke Energy is really pushing the boundaries of the National Environmental Policy Act, which, of course, they're entitled to do. Any corporation is entitled to push the boundaries of any law. But the Nuclear Regulatory Commission is bound by a higher standard.

That's our government agency. And they should have just laughed at Duke and said, "We are going to analyze the impacts using plutonium fuel in your reactors staring in 2007, because that will be the licensing basis that you are proposing. The current licensing basis is low-enriched uranium fuel." And under this action, they are assuming that throughout the license activities now conducted, it will continue to be conducted in accordance with the use of low-enriched uranium fuel.

But that's not true, because Duke wrote one little paragraph about the use of MOX plutonium. They wrote they're currently evaluating and planning for the use of MOX fuel in batch quantities up to 40 percent in McGuire and Catawba, planning to submit later this year a license amendment request to allow a limited number of MOX fuel assemblies. Use of those assemblies to begin no earlier than 2003.

The schedule calls for the submittal in late 2003 or early 2004. Right about the time they're going to decide on whether they should get relicensed for low-enriched uranium, then they're going to -- I'll bet you anything if they get relicensed January 2004, they submit the amendment in February of 2004. You know, that's what I would recommend if I was your advisor to be totally legal. And then that way the NRC doesn't get sued as bad either.

So this process completely circumvents the National Environmental Policy Act, and I would implore the people doing this, other contractors back there from Pacific Northwest National Laboratory, Lawrence Livermore National Laboratory, Los Alamos National Laboratory Argonne National Laboratory, they're the ones doing the environmental impact statement, by the way, because they've been contracted by the NRC, which is supposed to be independent from the Department of Energy, but it all depends on what day of the week it is, I guess.

You have to read what the National Environmental Policy Act says, not what the regulations say first but read the Act. It's one of the most stirring pieces of legislative literature I've ever encountered. And that was during the Nixon Administration, and he signed it. He's not known as a rabid environmentalist.

And the primary purpose of this relicensing is to analyze the aging impacts, the impacts of operation on aging of chief components. It isn't just plutonium fuel, of which these are the only four reactors that are being considered right now. In 1996 there were 17 utilities that controlled 38 reactors that were interested, and they slowly lost interest, because the Department of Energy is not known as a reliable and trusted partner. They generally don't get things done. It's unfortunate, but they generally don't get things done.

On October 8, 1999, the NRC granted the licensee, Duke Energy, an exemption that would allow them to apply early, to allow them to apply before their 20 years of operation is up. Since that time, though -- and that was based on one -- one of the basis of that was a statement by Duke that said, "A regular and systematic exchange of information of plant-specific

operating experience among all three Duke Nuclear Stations takes place."

About a year later, and shortly after the Oconee Plant was relicensed, they found these initiation and growth of significant cracks in PWR Alloy 600 weldments, apparently at growth rates that are faster than previously modeled. So this represents what Dave Lockbaum, who's a nuclear scientist, nuclear engineer with the Union of Concerned Scientists, said that the aging failures that have occurred in the last few years indicate beyond a reasonable doubt that the aging management programs in support of relicensing are inadequate because they are not preventing equipment failures, such as the VC summer hot leg nozzle to pipe weld crack that had some potential generic issues, such as they found that they were due to extensive weld repairs during construction occurred on those areas. It added stress to those.

So let's look at all the major components out there, the reactors, Catawba and McGuire, and see where they were doing work out in the field that normally would have been done in the shop or where they've had maintenance problems. Because the one Duke hasn't done well in previous analyses, the one thing they've always had a little bit of trouble with -- they're not the worst but neither are they the best; they're kind of like right in the middle, they're a model of mediocrity. They have had maintenance problems, and that's documented. And when you have maintenance problems, things break down quicker.

Here's another one. This one is very interesting, because this one just happened this year. But in a letter of last year, last July 20, 2000, Duke submitted for an exemption. It's called a request for relief. Apparently, Duke put in, in Catawba 1 and McGuire 1, replacement steam generators. The

1 pre-service examinations were not performed during manufacturing or prior to 2 installation. Instead the licensee performed on-site pre-service exam after 3 installation and under the provisions of another code, and they violated ASME, Association -- America Society of Mechanical Engineers, thank you. 4 5 MR. CAMERON: Don, could I ask you to --MR. MONIAK: And those people don't fool around. I'm just 6 7 about --8 MR. CAMERON: Could I ask you to wrap up? 9 MR. MONIAK: Yes. They don't fool around with their rules 10 and we know that. They're only able to cover 50 to 75, 83 percent at the most, 11 of some major important welds on their steam generators, which are brand 12 new. That's not good business. And the NRC couldn't do anything about it, 13 because they were hot by then, and they had to say, "Well, I guess we've got 14 to give it to you." 15 So we've heard enough about security tonight. I would also like to add, though, that the State of Nevada has filed a petition for changing. 16 17 Congress has filed legislation to change security requirements. It's time to dismiss this, because three years from now it may just be that nuclear power 18 19 is just a lot more expensive than Duke is willing to admit and that Duke's willing 20 to take. And, personally -- this is not the opinion of Blue Ridge -- but, 21 personally, I think the utilities ought to be given a subsidy just the airliners to 22 help convert away from it. But if they have no desire to convert, we'll fight them 23 tooth and nail and try to stop them. Thank you. 24 MR. CAMERON: Thank you, Don. Yes, I do. You're

Edmund Fitzgerald? If, Sherry, you're done? Okay. Good. Please, come on

25

up.

2.0

MR. FITZGERALD: I am Ed Fitzgerald, and I am a bona fide resident of Rock Hill, South Carolina. I've lived here for over 22 years, so I guess I've passed one of the tests of longevity. But I also am the Chair of the South Carolina Sierra Club, which represents -- and I represent tonight the 5,000 members throughout the State of South Carolina who are members of the Sierra Club, a long-standing environmental organization, national in scope. I thank you for the opportunity to speak to you this evening.

The South Carolina chapter of the Sierra Club has been

following this licensing renewal process for Duke Energy for some time.

Leading up to these hearings an integral component of Duke's activities has been a public relations effort to educate the public on its plans to very shortly introduce MOX as a fuel in the Catawba Station.

This MOX is to be fabricated from weapons-grade plutonium that is to be shipped to South Carolina's Savannah River Site. The Governor of South Carolina is opposed to these shipments unless the Department of Energy agrees to a clear exit strategy. At this time, no agreement has been reached.

Duke Energy, in its public relations efforts to embrace MOX as an alternate fuel source, places heavy emphasis on the cost effectiveness of MOX and on reducing the inventory of weapons-grade material. If the long-range strategy is to introduce MOX as a fuel, the South Carolina Sierra Club finds it strange that the license renewal does not state that the Plant will use MOX as a fuel source during the operating life of the request.

On Saturday, October 20, the South Carolina Sierra Club

unanimously passed Resolution Number 01-05, titled, "Plutonium Disposition as Mixed Oxide Reactor Fuel." I will not read you the entire resolution but will only cite those sections that refer to MOX and the Catawba Nuclear Station. A copy of the complete resolution is attached to my remarks, which I will give to Jim Wilson, hopefully for insertion into the record of this meeting.

The South Carolina Chapter of the Sierra Club expresses its support, that's very key, it expresses its support for Governor Hodges' call for the restoration of funding for plutonium immobilization. Let me repeat that: We support Governor Hodges' call to restore funding for plutonium immobilization. Plutonium is a key component of nuclear weapons and also can be a deadly component of irradiation dispersal weapon. Consequently, plutonium is an attractive object for theft by terrorists and rogue governments, as such poses a critical risk at all vulnerable points in transportation and in handling.

The use of MOX fuel instead of traditional uranium fuel in the Catawba Nuclear Station could increase greatly the number of cancer deaths in a core melt accident due to the presence of greater quantities of high radiotoxic elements. Use of MOX fuels in these reactors, for which they were not designed, may pose additional and yet unknown, unknown, operating risks.

The Catawba Plant is one of the thin-walled, ice condenser designs and is more vulnerable to a catastrophic early containment failure that would release radioactive materials into the environment. The use of irradiated MOX will still contain plutonium after burning and will remain stored on the Site and may never exit South Carolina.

Regarding today's proceedings, the South Carolina Chapter of the Sierra Club unanimously opposes the shipment of plutonium by the

1 Department of Energy to South Carolina's Savannah River Site for fabrication 2 as MOX and the shipment, use and storage of MOX fuel at the Catawba Nuclear Station. 3 4 Furthermore, in that the application for license renewal under 5 scoping review today does not indicate that the Catawba Nuclear Station will 6 utilize MOX as part of its fuel component, the South Carolina Sierra Club views 7 this application as incomplete and seriously flawed. The Club recommends that NRC immediately instruct Duke Energy to withdraw its application and that 8 9 this process be terminated. Thank you very much. MR. CAMERON: Thank you very much, Mr. Fitzgerald. Our 10 11 last speaker for tonight is Trey Eubanks, and Mr. Eubanks is the City Manager, 12 I believe, of York; is that correct? 13 MR. EUBANKS: That's correct. Thank you. 14 MR. CAMERON: Okay. You're welcome. 15 MR. EUBANKS: Good evening. It's a pleasure for me to represent the city of York in support of Catawba Nuclear's license renewal. My 16 17 name is Trey Eubanks. I'm the York City Manager. I've been a resident of the community and a satisfied Duke Power customer for the past four and a half 18 19 years. I'm glad to endorse Catawba's petition tonight. Duke Energy's been a 20 valued corporate citizen for many years. Its employees are hardworking 21 members of surrounding communities, active in our schools, churches and civic 22 organizations. In addition to the obvious asset of generating safe, reliable 23 energy for our homes and businesses, Duke Energy participates in the 24 activities of our area, annually supporting the efforts of the United Way, the

Red Cross, Adopt-a-Highway Programs and other civic activities.

25

1	
2	
3	
4	
5	
6	

The City of York confidentially relies on Duke Energy to power our water treatment facility serving the city and the surrounding community within our service territory. Our bonds are further strengthened by a franchise agreement that the City of York renewed a few years ago with Duke Power. We are confident that Duke Energy Corporation employs responsible, dedicated workers who take pride in the first class service that they provide to our community. And on behalf of Mayor Roddy Connelly and myself, we whole-heartedly support Catawba's request for the license renewal.

MR. CAMERON: Okay. Thank you, Mr. Eubanks. I wanted to thank all of you tonight for your attention and for your specific comments, and I would just note that we have heard two requests for an extension of the comment period that the NRC will consider. We have a form up here, and it's out on the desk. It's a questionnaire, a short questionnaire that helps us to evaluate how we can improve public meetings. So if you could, give that a little bit of attention. And, Mary, you have a question?

MS. OLSON: I went to the trouble to copy some articles that have been out recently on some of the issues talked about tonight, and they're in a table next door, along with NRC literature, and I'm sure there's Duke literature there as well. But, anyway, I wanted to bring that to people's attention.

MR. CAMERON: Yes. And just let me add that various organizations have material next door, and also the NRC staff and the scientists from the National Labs that are helping us to evaluate the environmental impacts are here tonight. So please feel free to have informal discussions with them. Any questions that you would like to ask, the staff will

	61
1	be here. And I would just thank you all for coming out tonight and sharing your
2	thoughts with us. Good night.
3	(Whereupon, the Public Meeting was concluded.)
4	
5	
6	
7	
8	
9	
10	
11	Written Material Provided at October 23, 2001
12	Scoping Meeting:
13	
14	1. Letter from the Sierra Club, dated October 23, 2001, with attached
15	Resolution #01-05, "Plutonium Disposition As Mixed Oxide (MOX)
16	Reactor Fuel."
17	
18	
19	