

August 8, 2012

MEMORANDUM TO: Mark Tonacci, Chief
Licensing Branch 4 (LB4)
Division of New Reactor Licensing
Office of New Reactors

FROM: Brian Hughes, Project Manager */RA/*
Licensing Branch 4 (LB4)
Division of New Reactor Licensing
Office of New Reactors

SUBJECT: SUMMARY OF A PUBLIC MEETING BETWEEN THE U.S. NUCLEAR
REGULATORY COMMISSION AND FLORIDA POWER AND LIGHT
CONCERNING REQUEST FOR INFORMATION RESPONSE ISSUES
FOR THE COMBINED LICENSE APPLICATION FOR TURKEY POINT
UNITS 6 AND 7

The U.S. Nuclear Regulatory Commission (NRC) held a Category1 public meeting on July 24, 2012, at 8:00 a.m., at NRC's headquarters office located in Rockville, Maryland. The NRC Office of New Reactors (NRO) staff met with Florida Power and Light (FPL) and other stakeholders to discuss the FPL response to requests for information related to Chapter 2.5, "Basic Geological and Seismic Information" and for the staff to ask questions or note any concerns to support the safety review of the FPL licensing actions for Turkey Point Units 6 and 7. Enclosure 1 lists the meeting attendees (ML12213A311).

A public meeting notice was issued on July 10, 2012, and was posted on the NRC's external (public) web page (Agencywide Documents Access and Management System (ADAMS) Accession No. ML12185A210). The notice included the meeting agenda, which was also available as a handout at the meeting. Several members of the public took advantage of the toll free telephone line made available for this meeting.

In opening remarks Mr. Brian Hughes of the NRC staff noted that in the May 4, 2012, letter (ADAMS Accession No. ML120740390) the NRC advised FPL that the review activities of the Combined License Application for Turkey Point Units 6 and 7 for Chapter 2.5, "Basic Geological and Seismic Information" was still suspended and a decision to continue that review would not be provided at this meeting. The corrective actions, and root causes of the deficiencies would be reviewed by NRC management prior to a decision to continue the review. Also, the staff will evaluate a new schedule following the NRC staffs evaluation of revised final safety analysis report (FSAR) Sections 2.5.1-2.5.5 of the Turkey Point Units 6 and 7 COLA.

CONTACT: Brian Hughes, NRO/DNRL
(301) 415-6582

FPL's presentation included the quality assurance results of an FPL conducted audit. FPL determined that there were inadequate reviews of technical responses associated with geology, seismology, and geotechnical engineering, which resulted in answers to NRC Requests for Additional Information (RAI) that were poor quality. They categorized them into two groups; incomplete technical information or errors, and positions taken that were not appropriately justified.

FPL's corrective actions included, hiring a technical expert familiar with Florida geology, and seismic sources. FPL is performing a 100 percent review of all FSAR 2.5 RAI responses, and instituting a double review process. FPL's contractor is also taking actions to determine an apparent cause. FPL will be reviewing the contractor's corrective actions which will be completed by October, 2012.

Discussion

The NRC staff raised questions regarding the schedule dates, and proposed methodology. Key technical issues in areas related to geology, seismology and geotechnical engineering were discussed by FPL, their contractors and NRC's staff. FPL presented information on the technical approach followed to resolve key issues stated in the May 4, 2012, letter to FPL (ADAMS Accession No. ML120740390). Revised RAI responses are expected to be submitted to NRC between September 12 and September 30, 2012, with the updated FSAR on September 30, 2012. FPL went over the results of their quality assurance audit and corrective actions and changes. In addition, FPL and their contractors presented a summary of significant technical changes expected in updated RAI responses and FSAR revisions for Section 2.5. The following topical area issues were discussed:

Geology

FPL's contractor addressed significant technical changes that we can expect in RAI responses and in the revised FSAR for geologic topics including; Florida marine terraces, karst processes at the site area and location, young faulting in the region (Walker's Cay fault, Cunningham et al's fault, Straits of Florida faults, faults on the Cuba mainland (within or intersecting the 200 mi region of the site), uplifted marine terraces along Northern Cuba coast.

Seismology

The applicant described its progress in upgrading the Senior Seismic Hazard Advisory Committee process used for the development of the Caribbean GMPEs to a Level 2 Study. The applicant also discussed how it is addressing the concerns of the NRC staff with respect to the use of a single areal seismic source for the Cuba region and explained the process it is using to compare the single areal source seismic hazard results with those obtained from multi-source models.

Geotechnical Engineering

The applicant briefly addressed how variability and uncertainties were taken into account when determining key geotechnical engineering properties. In order to do so, the applicant referred to field and lab data, site uniformity and key rock and soil properties determined for the Turkey Point site. The applicant explained how these soil and rock properties were derived and justified their applicability in characterizing the Turkey Point site. In addition, the applicant

discussed some of the assumptions used and the level of conservatism established in the foundation stability analyses.

In their assessment of potential cavities and/or voids beneath safety related structures the applicant relied on FSAR Section 2.5.4 related to rod drops, descriptions of the site vicinity limestone and location of geophysical surveys. In addition, the applicant committed to perform additional geophysical surveys at base of the excavation.

The applicant stated that additional details and justifications will be provided in updated RAI responses and FSAR updates to further support their safety conclusions. The level of details in these updates is unknown at this moment.

Public Participation

Ms. S. Barczak and Ms. M. Hancock of Southern Alliance for Clean Energy, and Ms. R. Roff participated by telephone asked the NRC to look into video or web casting for future public meetings.

Enclosed is the meeting attendees list (Enclosure 1), meeting notice (ADAMS Accession No. ML12185A210, Enclosure 2), and handouts provided by FPL (ADAMS Accession No. ML12213A403 and ML12213A405, Enclosure 3).

Docket Nos.: 052-040 and 052-041

Enclosures:

1. Meeting Attendees List
2. Meeting Agenda
3. Handouts

cc w/encls: See next page

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ADAMS Accession No.: Package - ML12213A300
 Meeting Attendees List - ML12213A311
 Meeting Agenda - ML12185A210
 Handouts - ML12213A403 and ML12213A405

OFFICE	LA: DNRL/LB4	PM: DNRL/LB4
NAME	RButler	BHughes
DATE	07/30/2012	08/08/2012

COL - Turkey Point Mailing List

(Revised 05/21/2012)

cc:

Ms. Michele Boyd
Legislative Director
Energy Program
Public Citizens Critical Mass Energy
and Environmental Program
215 Pennsylvania Avenue, SE
Washington, DC 20003

Mr. Steve Franzone
Florida Power & Light Company
Turkey Point Nuclear Plant
700 Universe Blvd.
Juno Beach, FL 33408

Mr. William Maher
Florida Power & Light Company
Turkey Point Nuclear Plant
700 Universe Blvd.
Juno Beach, FL 33408

Mitchell S. Ross
Vice President and General Counsel
Nuclear
Florida Power & Light Company
Mail Stop LAW/JB
700 Universe Blvd.
Juno Beach, FL 33408

Dr. Greg Rzentkowski
Canadian Nuclear Safety Commission
P.O. Box 1046, Station 'B'
280 Slater Street
Ottawa, ON, K1P 5S9
Canada

Thomas Saporito
President
Saporito Energy Consultants, Inc.
Post Office Box 8413
Jupiter, FL 33468-8413

COL - Turkey Point Mailing List

Email

alliance4cleanfl@aol.com (Bob Krasowski)
APH@NEI.org (Adrian Heymer)
awc@nei.org (Anne W. Cottingham)
Bill.Jacobs@gdsassociates.com (Bill Jacobs)
billn@fcan.org (Bill Newton)
BrinkmCB@westinghouse.com (Charles Brinkman)
bwtamia@bellsouth.net (Barry White)
CumminWE@Westinghouse.com (Edward W. Cummins)
cwaltman@roe.com (C. Waltman)
david.lewis@pillsburylaw.com (David Lewis)
ed.burns@earthlink.net (Ed Burns)
George.Madden@fpl.com (George Madden)
gzinke@entergy.com (George Alan Zinke)
jerald.head@ge.com (Jerald G. Head)
john.elnitsky@pgnmail.com (John Elnitsky)
Joseph_Hegner@dom.com (Joseph Hegner)
KSutton@morganlewis.com (Kathryn M. Sutton)
kwaugh@impact-net.org (Kenneth O. Waugh)
lchandler@morganlewis.com (Lawrence J. Chandler)
maria.webb@pillsburylaw.com (Maria Webb)
mark.beaumont@wsms.com (Mark Beaumont)
matias.travieso-diaz@pillsburylaw.com (Matias Travieso-Diaz)
MCCRAS@miamidade.gov (Sean McCrackine)
media@nei.org (Scott Peterson)
Mike.Halpin@dep.state.fl.us (Mike Halpin)
Mitch.Ross@fpl.com (Mitch Ross)
MSF@nei.org (Marvin Fertel)
nirsnet@nirs.org (Michael Mariotte)
Nuclaw@mindspring.com (Robert Temple)
patriciaL.campbell@ge.com (Patricia L. Campbell)
Paul.Jacobs@fpl.com (Paul Jacobs)
Paul@beyondnuclear.org (Paul Gunter)
pbessette@morganlewis.com (Paul Bessette)
Raymond.Burski@fpl.com (Raymond Burski)
Richard.Orthen@fpl.com (Richard Orthen)
RJB@NEI.org (Russell Bell)
sabinski@suddenlink.net (Steve A. Bennett)
saporito3@gmail.com (Thomas Saporito)
sfrantz@morganlewis.com (Stephen P. Frantz)
stephan.moen@ge.com (Stephan Moen)
Steve.Franzone@fpl.com (Steve Franzone)
steven.hamrick@fpl.com (Steven Hamrick)
toner-irene@monroecounty-fl.gov (Irene Toner)

COL - Turkey Point Mailing List

Vanessa.quinn@dhs.gov (Vanessa Quinn)
Wanda.K.Marshall@dom.com (Wanda K. Marshall)
William.Blair@FPL.com (William Blair)
william.maher@fpl.com (William Maher)

ATTENDEE LIST
MEETING WITH FLORIDA POWER AND LIGHT
JULY 24, 2012

Name	Affiliation
Brian Hughes	NRC
Frankie G. Vega	NRC
Meralis Plaza-Toledo	NRC
Dogan Seber	NRC
Rebecca Karas	NRC
Alice Stieve	NRC
Ray Burski	FPL
Steve Franzone	FPL
Bill Maher	FPL
Rick Weis	FPL
Stephen Routh	Bechtel
Alexis Lavine	AMEC
Marc Ryan	AMEC
John Conliffe	Bechtel
Bob Yamrus	Bechtel
Steve Hamrick	FPL
Manny Comar	NRC
Craig Talbot	Bechtel
Kenneth Bell	Bechtel
Ron Anstey	Bechtel
Joe Litehiser	Bechtel
Scott Lindvall	Lettis Consultants, International
Stephanie Briggs	Lettis Consultants, International
Ross Hartleb	Lettis Consultants, International
Sarah Price	NRC
Gerald McLane	Bechtel
David Fenster	Bechtel
Dean Ostenaar	FCL (Fugro)
Prauiu Patel	NRC

MEETING AGENDA

Turkey Point Unit 6 and 7 Combined License Application Status of Section 2.5 of the Final Safety Analysis Report Tuesday, July 24, 2012

8:00 a.m. – 5:00 p.m.
NRC Headquarters, One White Flint North, Room O-3B04

TIME	TOPIC	LEAD
8:00 a.m.	Introductions and Overview	NRC/FPL
8:30 a.m.	Schedule and plan for submittals	FPL
8:45 a.m.	Audit results, corrective actions and changes	FPL
	<ul style="list-style-type: none">• Overview of major findings• Results of “extent of condition”	
10:00 a.m.	Significant technical changes, not stated in NRC’s May 4, 2012, letter	FPL
10:30 a.m.	Break	
10:45 a.m.	Technical approach and resolution of key issues	FPL/NRC
	<ul style="list-style-type: none">• Characterization of Caribbean region ground motion prediction equations GMPE and Senior Seismic Hazard Advisory Committee process• Revisions to seismic source and how were they incorporated into the probabilistic seismic hazards assessment	
11:45 a.m.	Opportunity for Public comment	
12:00 noon	Lunch	
1:00 p.m.	Technical approach and resolution of key issues	FPL/NRC
	<ul style="list-style-type: none">• Revisions concerning young faulting within the Turkey Point site region• Revisions concerning limestone dissolution features in the site vicinity and location• Variability and uncertainties in key geotechnical engineering properties• Assumptions taken in key safety analysis in the geotechnical areas (bearing capacity, settlement and lateral earth pressures)• Assessment of potential cavities and/or voids beneath safety related structures	
4:30 p.m.	Opportunity for Public comment	
4:45 p.m.	Summary of discussions, path forward and wrap-up	FPL/NRC
5:00 p.m.	Adjourn	

Handouts

ADAMS No. ML12213A403 and ML12213A405