



August 7, 2012

L-2012-309  
10 CFR 50.90

U.S. Nuclear Regulatory Commission  
ATTN: Document Control Desk  
Washington, DC 20555

Re: St. Lucie Plant Unit 1  
Docket No. 50-335  
Renewed Facility Operating License No. DPR-67

FPL Review Comments on Extended Power Uprate Safety Evaluation

Reference:

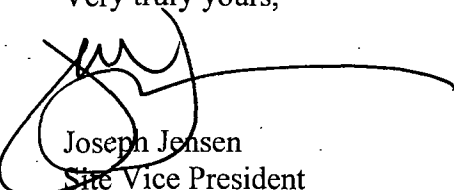
- (1) T. Orf (NRC) to M. Nazar (FPL), "St. Lucie Plant, Unit 1 – Issuance of Amendment Regarding Extended Power Uprate (TAC No. ME5091)" July 9, 2012 (Accession No. ML12156A208)

On July 9, 2012, the U. S. Nuclear Regulatory Commission (NRC) issued extended power uprate (EPU) Amendment No. 213 for Renewed Facility Operating License DPR-67 for St. Lucie Plant Unit 1 [Reference 1]. The amendment included the revised EPU license conditions and technical specifications, as well as a safety evaluation (SE). Florida Power & Light Company (FPL) reviewed the EPU proprietary SE and comments are provided in the attachment to this letter.

In accordance with 10 CFR 50.91(b)(1), a copy of this letter is being forwarded to the designated State of Florida official.

Should you have any questions regarding this submittal, please contact Mr. Jack Hoffman, St. Lucie Extended Power Uprate LAR Project Manager, at 772-467-7493.

Very truly yours,



Joseph Jensen  
Site Vice President  
St. Lucie Plant

Attachment

cc: Ms. Cynthia Becker, Florida Department of Health

ADD1  
NRK

### Review Comments on Extended Power Uprate Safety Evaluation

No.	Section, Page, Paragraph, Line	Document Statement	Review Comment	Suggested Change
1.	2.4.1 pg 95 6 <sup>th</sup> para 3 <sup>rd</sup> line	"Therefore, the IR error due to high radiation for normal and accident conditions is negligible."	RAI response to EICB-11 in FPL letter L-2011-565 (Acc. No. ML12019A067) does not describe radiation as a failure mechanism for insulation resistance. Temperature causes insulation resistance changes.	Revise to replace "radiation" with "temperature."
2.	2.5.4.3 pg 136 1 <sup>st</sup> para 7 <sup>th</sup> line	"...temperature by minimizing eat removal and..."	Typos	Change "eat" to "heat"
	2.8.4.5 pg 193 Title	<u>Shudown Cooling System</u>		Change " <u>Shudown</u> " to " <u>Shutdown</u> "
	2.8.5.4.3 pg 223 3 <sup>rd</sup> para 2 <sup>nd</sup> line	"Power level to a minimum value in 3 seconds..."		Change to read: "Power level drops to a minimum value in 3 seconds..."
3.	2.8.5.2.3 pg 207 3 <sup>rd</sup> para 3 <sup>rd</sup> line	<u>Loss of Normal Feedwater Flow</u> "Only one SG received auxiliary FW due to an assumed single failure in the AFWS."	Both steam generators received auxiliary feedwater flow See EPU LAR Attachment 5 Section 2.8.5.2.3 pg 2.8.5.2.3-4	Replace sentence with the following: "Both SGs received auxiliary FW from two motor driven AFW pumps with an assumed failure of the steam driven AFW pump."

**Review Comments on Extended Power Uprate Safety Evaluation**

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4.	2.8.5.6.2.2 pg 243 2 <sup>nd</sup> para after bullets 11 <sup>th</sup> line	"... the containment steam of 182,750 lbm was released from the affected SG."	Typo – See FPL letter L-2011-311 Attachment 1 pg 35 Table 7 (Acc. No. ML11231A946)	Change "182,750 lbm" to "182,705 lbm"
5.	2.8.5.6.3.1 pg 247 4 <sup>th</sup> para 6 <sup>th</sup> line & 6 <sup>th</sup> para 4 <sup>th</sup> line	SE refers to "ANP-2834(P)"	Incorrect reference - See FPL letter L-2011-206 (Acc. No. ML11153A048)	Change "ANP-2834(P)" to "ANP-2903(P) Rev. 1"
6.	2.8.5.6.3.1 pg 250 1 <sup>st</sup> para 2 <sup>nd</sup> line	"The licensee stated that A <sub>min</sub> was calculated to be 26.7 percent..."	Correct value is "29.97 percent" See FPL letter L-2011-206 Attachment 2 pg 4-25 (Acc. No. ML11153A048)	Change "26.7 percent" to "29.97 percent"
7.	2.8.6 pg 257 3 <sup>rd</sup> para 4 <sup>th</sup> line & pg 258 1 <sup>st</sup> para 3 <sup>rd</sup> line	SE refers to "Monte Carlo code MCNP5"	Incorrect reference – See EPU LAR Attachment 5 Table 1.0-2	Change "MCNP5" to "MCNP4A"

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8.	2.8.7.2 pg 267 last para continued on pg 268	"...reached in less than 13 hours (12.5 hours with 30°F/hr and uses 177,000 gallons of condensate, or 11.0 hours with 50°F/hr and uses 170,000 gallons of condensate)."	Incorrect based on revised Natural Circulation Cooldown evaluation See FPL Letter L-2012-079 (Acc. No. ML12086A202)	Change the following: "12.5 hours" to "24.8 hours" "177,000 gallons" to "287,000 gallons" "11.0 hours" to "23.7 hours" "170,000 gallons" to "291,500 gallons"
	pg 268 1st para last sentence	"The EPU analyses show that the condensate volume requirement in the CLB is bounding for the EPU Conditions."		Replace last sentence with the following: "The increase in NCC condensate requirements for EPU is acceptable as makeup water can be supplied to the CST from the two 500,000 gallon city water storage tanks consistent with the CLB."
9.	2.9.2.2.2 pg 287 3 <sup>rd</sup> para 1 <sup>st</sup> to 5 <sup>th</sup> lines	"The licensee stated that the St. Lucie 1 core design... limited to 150 rods. Conservatively, the licensee..."	This core design restriction is not applicable to the EPU core. EPU LAR Attachment 5 Section 2.9.2.2.1.1 pg 2.9.2-4, Section 2.9.2.5.2 pg 2.9.2-11, & Section 2.9.2.7.2 pg 2.9.2-15	Delete the first three sentences. Delete "conservatively," from the new first sentence such that it reads: "The licensee evaluated the EPU AST analyses..."
	10 <sup>th</sup> line	"...high burnup fuel rods from the actual 0.393 percent of the core to 4.608 percent..."		Delete "from the actual 0.393 percent of the core" such that it reads "...high burnup fuel rods to 4.608 percent..."
10.	2.12 pg 341 1 <sup>st</sup> para 9 <sup>th</sup> line	"requested for St. Lucie 1 (3026 MWt and 3020 MWt, respectively)..."	Typo – See EPU LAR Attachment 5 Section 2.12.1.2.2 pg 2.12-3	Change "3020 MWt" to "3716 MWt"