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SUBJECT: Provides addl info re util proof & review comments on
 Section 3.8 electrical power sys.

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FEBRUARY 15 1989

L-89-46

U. S. Nuclear Regulatory Commission
Attn: Document Control Desk
Washington, D. C. 20555

Gentlemen:

Re: Turkey Point Units 3 and 4
Docket Nos. 50-250 and 50-251
Electrical Power System License Amendment

The purpose of this letter is to provide additional information regarding Florida Power & Light Company's proof and review comments on Section 3.8, Electrical Power Systems. In our letters, L-88-511 dated December 20, 1988 and L-89-31 dated January 24, 1989, we submitted a request for an electrical system license amendment and proof and review comments on Section 3.8, respectively. Our comments on Section 3.8, simply converted our proposed license amendment into standard technical specification format for issuance with the final draft of the revised technical specifications. A few additional surveillance requirements were added to these comments for completeness.

The electrical power system revised technical specifications were further discussed at an FPL-NRC management meeting in Rockville on January 25, 1989, to determine the best process to incorporate improved electrical power system specifications in light of the forthcoming installation of additional emergency diesel generators and upgrading of the plant electrical systems. It was decided that because FPL would be providing further revisions to the electrical technical specifications as part of the diesel generator addition project, an interim set of specifications similar to our submittal would be appropriate if there was assurance that these specifications would be at least as conservative from a safety standpoint as the current specifications. FPL representatives agreed to provide that confirmation.

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FPL has reviewed the submittal against the current requirements and has determined that, on the whole, the submittal is more conservative than the current technical specifications. The submittal has essentially modified the current requirements to add restrictions for Modes 5 and 6, for Generic Letter 84-15 and has added limits on out of service times for the diesel generators. Each of these general changes can be considered conservative because they have corrected identified weaknesses in the current specifications. Our review has identified several proposed specifications which could, on an individual basis, be considered less restrictive than our current specifications. For completeness, we have detailed the differences between the proposed and current specifications in the attachment to this letter. Provided with each specification comparison is a summary of the basis for the FPL proposal.

It is our judgement that these proposals are reasonable and appropriate for issuance in the final draft of the revised technical specifications. We will continue to work in parallel with the staff reviewers to finalize approval of our proposed license amendment to the current technical specifications. We understand that significant changes developed in that review may make it necessary for the staff to issue a change to the final draft and for us to update our certification of the final draft.

Very truly yours,

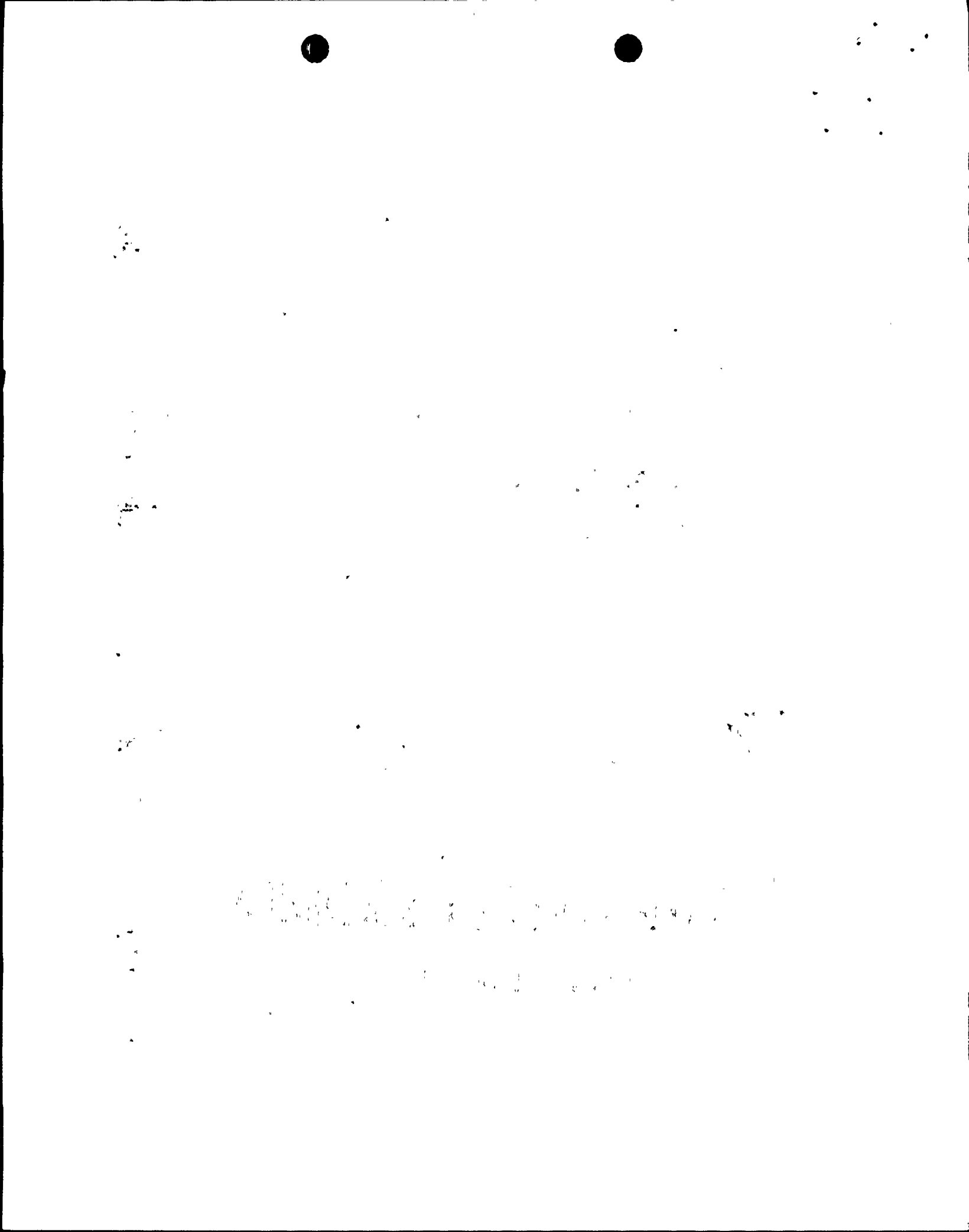


W. F. Conway
Senior Vice President - Nuclear

WFC/PLP/gp

Attachment

cc: Malcolm L. Ernst, Acting Regional Administrator, Region II,
USNRC
Senior Resident Inspector, USNRC, Turkey Point Plant



ATTACHMENT

1. Start Up Transformers (CTS 3.7.2.b/RTS 3.8.1.1. Action d.)

The current specification allows continued operation with one diesel generator out of service provided either start up transformer is operable and the other diesel generator is tested daily and its associated engineered safeguards features are operable. Notification to the NRC is required if the diesel outage is to be seven days or longer. A separate specification (CTS 3.7.2.a) requires both diesels to be operable if a startup transformer is out of service.

The proposed specification requires a power reduction to 30% instead of a shutdown for an inoperable start up transformer combined with a diesel generator out of service if in Mode 1. Shutting down the plant in this condition would result in a challenge to the emergency diesel generator, loss of power to the reactor coolant pumps, and the unit would be forced into a natural circulation cooldown. It is our judgement that stable low power operation is preferable from a safety standpoint to intentionally placing the unit into a natural circulation transient and challenging the engineered safety features. This could be considered a relaxation from the CTS, but it is our judgement that this approach is more conservative from a safety standpoint.

2. Start Up Transformers (CTS 3.7.2.d/RTS 3.8.1.1. Action f.)

The current specification requires compliance with Technical Specification (TS) 3.0.1 in the event the other action statements regarding electrical systems cannot be complied with. Because no specific action statement is provided for both start up transformers out of service, this specification would require a prompt plant shutdown. This would cause the natural circulation transient discussed above. The proposed specification requires a power reduction if in Mode 1. If in Modes 2, 3 or 4, a cooldown is required.

3. Emergency Diesel Generators (CTS 3.7.2.d/RTS 3.8.1.1. Action e.)

The current specification requires compliance with TS 3.0.1 in the event two emergency diesel generators are inoperable. This specification would require the unit to be in hot standby within seven hours.

The proposed specifications regarding simultaneous dual unit shutdown allow 12 hours for the second unit to be in hot standby. This proposed specification also requires checking



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for availability of a startup transformer prior to shutting down. This ensures that power is available for safety equipment during the shutdown.

4. Diesel Generator Surveillance (CTS 4.8.1.d/RTS 4.8.1.1.1.d)

The current specifications requires certain tests of the generator on a once per 18 month frequency.

The proposed specification requested a frequency of once per refueling. FPL has previously agreed to use the 18 month interval. This should have been changed to 18 months to reflect our earlier agreements.

In addition the diesel generator test schedule in CTS 4.8.1 was changed in the RTS for the lowest category of failures from once per 30 days to once per 31 days to be consistent with the standard technical specifications.

5. Diesel Generator Starts (CTS 4.8.1.a.4/RTS 4.8.1.1.1.a.3)

The current specification requires diesel generator starts from ambient conditions for all tests.

The proposed specification implements the recommendation of Generic Letter (GL) 84-15 to restrict the starts from normal conditions to once per 184 days to minimize cold fast starts. NRC concurrence to address the GL 84-15 requirements in the revised technical specification project was documented in a NRC letter dated December 15, 1986.

6. Diesel Generator Load Rejection Test (CTS 4.8.1.d.1.(b)/RTS 4.8.1.1.1.d.1(b))

The current specification requires a test to reject a diesel generator complete load without exceeding 4160 ± 624 volts and without exceeding over speed limits.

The proposed specification requires the same test but does not put an upper limit on voltage. It specifies that the generator cannot trip and that the generator voltage shall return to less than or equal to 4784 volts within two seconds. This specification checks for adequate performance of the voltage regulator.

7. Diesel Generator Testing (CTS 3.7.2.b/RTS 3.8.1.1. Action b.1)

In the event one diesel generator is out of service, the current specifications require, in part, that the remaining generator is tested daily. No specific guidance is provided concerning this testing. The practice has been to perform the



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surveillance requirements of CTS 4.8.1.a. which includes a requirement to synchronize and load the generator to greater than or equal to 2500 kw.

The proposed specification incorporates the standard technical specification requirement to only perform the surveillance requirement of RTS 4.8.1.1.1.a.3. This provides assurance that the generator is available and kept independent of disturbances on the offsite power systems that can affect emergency power availability.

8. Electrical Busses (CTS 3.7.1.b and c/RTS 3.8.3.1)

The current specifications require the A and B 4160V busses of the associated unit and either A or B bus of the opposite unit to be operable. They also require three of four 480 volt load centers and specific combinations of 480 volt motor control centers for the associated unit. Because there are no action statements provided, shutdown is required under TS 3.0.1. in the event one of these components is out of service.

The proposed specification requires all associated safety related 4160 volt busses, load centers and motor control centers on the associated unit to be operable to continue unit operation. In addition, requirements were added for the 4160 volt busses, and motor control centers (MCC) on the opposite unit as to their effect on the associated unit. An eight hour allowable out of service time is provided for the loss of one 4160 volt bus, MCC 3A(4A) or MCC D versus the current specification interpretation of TS 3.0.1. However, the eight hour allowable out of service time is consistent with the Standard Technical Specifications.

10. DC Sources (CTS 3.7.2.c/RTS 3.8.2.1)

The current specification would require compliance with TS 3.0.1 if an out of service battery is not restored to operable status in 24 hours. This would require both units to be in hot standby in 7 hours. This specification contains an action statement for battery chargers out of service which would require compliance with TS 3.0.1.

The proposed specification provides 12 hours to be in hot standby if the 24 hour allowed out of service time for the battery is exceeded. The addition of action statements for out of service battery chargers, allows appropriate restoration times.



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