

REGULATORY INFORMATION DISTRIBUTION SYSTEM (RIDS)

ACCESSION NBR: 8411050337 DOC. DATE: 84/10/30 NOTARIZED: NO DOCKET #
 FACIL: 50-387 Susquehanna Steam Electric Station, Unit 1, Pennsylv 05000387
 AUTH. NAME AUTHOR AFFILIATION
 CURTIS, N.W. Pennsylvania Power & Light Co.
 RECIP. NAME RECIPIENT AFFILIATION
 SCHWENCER, A. Licensing Branch 2

SUBJECT: Requests closure of License Condition 2.C.(4)(b) which requires new stability analysis, in order to satisfy GDC 12. License condition does not include option to detect & suppress power oscillations.

DISTRIBUTION CODE: A001D COPIES RECEIVED: LTR 1 ENCL 0 SIZE: 2
 TITLE: OR Submittal: General Distribution

NOTES: 1cy NMSS/FCAF/PM. LPDR 2cys Transcripts. 05000387
 OL: 07/17/82

	RECIPIENT ID CODE/NAME		COPIES LTTR ENCL		RECIPIENT ID CODE/NAME		COPIES LTTR ENCL
	NRR LB2 BC	01	7				
INTERNAL:	ADM/LFMB		1	0	ELD/HDS4		1
	NRR/DE/MTEB		1	1	NRR/DL DIR		1
	NRR/DL/ORAB		1	0	NRR/DSI/METB		1
	NRR/DSI/RAB		1	1	REG FILE	04	1
	RGN1		1	1			
EXTERNAL:	ACRS	09	6	6	LPDR	03	2
	NRC PDR	02	1	1	NSIC	05	1
	NTIS		1	1			
NOTES:			3	3			

TOTAL NUMBER OF COPIES REQUIRED: LTR 30 ENCL 27



Pennsylvania Power & Light Company

Two North Ninth Street • Allentown, PA 18101 • 215 / 770-5151

Norman W. Curtis
Vice President-Engineering & Construction-Nuclear
215/770-7501

OCT 30 1984

Director of Nuclear Reactor Regulation
Attention: Mr. A. Schwencer, Chief
Licensing Branch No. 2
Division of Licensing
U.S. Nuclear Regulatory Commission
Washington, D.C. 20555

SUSQUEHANNA STEAM ELECTRIC STATION
FACILITY OPERATING LICENSE NPF-14
CONDITION 2.C.(4)(b)
ER 100450 FILE 841-2
PLA-2339

Docket No. 50-387

Reference: Letter, A. Schwencer to N. W. Curtis, "Amendment No. 24 to Facility Operating License No. NPF-14 - SSES, Unit 1," dated October 9, 1984.

Dear Mr. Schwencer:

The purpose of this letter is to request closure of license condition 2.C.(4)(b) which requires a new stability analysis. NRC regulations address reactor thermal-hydraulic stability in 10CFR50 Appendix A, "General Design Criteria for Nuclear Power Plants." General Design Criteria (GDC) Number 12, "Suppression of Reactor Power Oscillations," states:

The reactor core and associated coolant, control, and protection systems shall be designed to assure that power oscillations which can result in conditions exceeding specified acceptable fuel design limits are not possible or can be reliably and readily detected and suppressed.

To satisfy GDC 12, a stability analysis for the first SSES operating cycle was performed which calculates a decay ratio and a damping factor. The decay ratio and damping factor are shown to be less than 1 and greater than 0, respectively, at the limiting plant operating condition. By meeting these criteria, the core is shown to be inherently stable and sustained limit cycles are not predicted. We, therefore, demonstrate compliance with GDC 12 by precluding power oscillations which can result in conditions exceeding specified acceptable fuel design limits for the first cycle.

Facility Operating License No. NPF-14 condition 2.C.(4)(b) requires that PP&L provide a new stability analysis indicating the results for appropriate exposure core conditions prior to startup following the first refueling outage. The intent of this license condition is to assure that the basis for

8411050337 841030
PDR ADCK 05000387
PDR

Aool
1/0



Handwritten marks or scribbles in the top right corner.

The main body of the page contains extremely faint, illegible text that appears to be a list or a series of entries. The text is too light to be read accurately but seems to follow a structured format, possibly including names, dates, or numerical identifiers.

OCT 30 1984

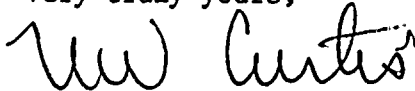
Page 2

SSES PLA-2339
ER 100450 File 841-2
Mr. A. Schwencer

compliance with GDC 12 is applicable to the next cycle. However the license condition is more restrictive than GDC 12 in that it does not include the option to detect and suppress power oscillations. With the approval of technical specifications implementing the guidance of General Electric Service Information Letter No. 380, Revision 1 (reference), PP&L has implemented procedures for detecting and suppressing power oscillations. We therefore comply with GDC 12 for future cycles by detecting and suppressing power oscillations and comply with the intent of license condition 2.C.(4)(b). Please close NPF-14 license condition 2.C.(4)(b).

Should you require further information on this subject please contact R. Woolley.

Very truly yours,



N. W. Curtis
Vice President-Engineering & Construction-Nuclear

cc: R. L. Perch - NRC
R. H. Jacobs - NRC

Handwritten notes in the top right corner, possibly including a date or reference number.

Faint text at the top left, possibly a header or title.

Main body of faint, illegible text, likely the primary content of the document.

Small handwritten mark or signature on the right side.

Second section of faint text, continuing the document's content.

Third section of faint text, possibly a list or detailed notes.

Fourth section of faint text, continuing the document's content.

Fifth section of faint text, possibly a conclusion or final notes.

Final section of faint text at the bottom of the page.