

A Subsidiary of RGS Energy Group, Inc.

ROCHESTER GAS AND ELECTRIC CORPORATION • 89 EAST AVENUE, ROCHESTER, N.Y. 14649-0001 • 716-771-3250

www.rge.com

JOSEPH A. WIDAY VICE PRESIDENT & PLANT MANAGER GINNA STATION

January 8, 2002

U.S. Nuclear Regulatory Commission Document Control Desk Attn: Robert Clark Project Directorate I Washington, D.C. 20555

Subject: Emergency Operating Procedures R.E. Ginna Nuclear Power Plant Docket No. 50-244

Dear Mr. Clark:

As requested, enclosed are Ginna Station Emergency Operating Procedures.

Very truly yours,

Joseph A. Widay

JAW/jdw

xc: U.S. Nuclear Regulatory Commission Region I
475 Allendale Road King of Prussia, PA 19406-1415

Ginna USNRC Senior Resident Inspector

Enclosure(s):

ATT Index ATT-2.4, Rev 1 ATT-14.1, Rev 5

Ports Previdence

REPORT NO. 01 REPORT: NPSP0200 DOC TYPE: PRATT ~,

£ر

٠,

1

PARAMETERS: DOC TYPES - PRATT

PRER

PRPT

PRPTT

STATUS: EF QU 5 YEARS ONLY:

PROCEDURE NUMBER	PROCEDURE TITLE	REV	EFFECT DATE	LAST REVIEW	NEXT REVIEW	ST
ATT-1.0	ATTACHMENT AT POWER CCW ALIGNMENT	001	07/26/94	02/10/98	02/10/03	EF
ATT-1.1	ATTACHMENT NORMAL CCW FLOW	000	05/18/00	05/18/00	05/18/05	EF
ATT-2.1	ATTACHMENT MIN SW	005	02/01/01	02/10/98	02/10/03	EF
ATT-2.2	ATTACHMENT SW ISOLATION	007	10/31/01	08/11/98	08/11/03	EF
ATT-2.3	ATTACHMENT SW LOADS IN CNMT	003	01/25/95	12/31/99	12/31/04	EF
ATT-2.4	ATTACHMENT NO SW PUMPS	001	01/08/02	10/31/01	10/31/06	EF
ATT-3.0	ATTACHMENT CI/CVI	005	01/25/99	01/06/99	01/06/04	EF
ATT-3.1	ATTACHMENT CNMT CLOSURE	003	01/25/99	01/25/99	01/25/04	EF
ATT-4.0	ATTACHMENT CNMT RECIRC FANS	003	07/26/94	05/13/98	05/13/03	EF
ATT-5.0	ATTACHMENT COND TO S/G	004	01/25/95	12/31/99	12/31/04	EF
ATT-5.1	ATTACHMENT SAFW	007	09/20/01	12/31/99	12/31/04	EF
ATT-5.2	ATTACHMENT FIRE WATER COOLING TO TDAFW PUMP	003	01/14/99	01/14/99	01/14/04	EF
ATT-6.0	ATTACHMENT COND VACUUM	003	12/18/96	02/10/98	02/10/03	EF
ATT-7.0	ATTACHMENT CR EVAC	005	02/11/00	02/10/98	02/10/03	EF
ATT-8.0	ATTACHMENT DC LOADS	006	03/22/99	01/14/99	01/14/04	EF
ATT-8.1	ATTACHMENT D/G STOP	004	11/03/95	02/10/98	02/10/03	EF
ATT-8.2	ATTACHMENT GEN DEGAS	006	08/17/99	08/17/99	08/17/04	EF
ATT-8.3	ATTACHMENT NONVITAL	003	07/26/94	02/10/98	02/10/03	EF
ATT-8.4	ATTACHMENT SI/UV	004	04/24/97	02/10/98	02/10/03	EF
ATT-9.0	ATTACHMENT LETDOWN	007	06/09/00	01/06/99	01/06/04	EF
ATT-9.1	ATTACHMENT EXCESS L/D	004	10/31/01	10/31/01	10/31/06	EF
ATT-10.0	ATTACHMENT FAULTED S/G	005	10/03/96	05/13/98	05/13/03	EF
ATT-11.0	ATTACHMENT IA CONCERNS	002	04/07/97	08/11/98	08/11/03	EF
ATT-11.1	ATTACHMENT IA SUPPLY	002	04/07/97	08/11/98	08/11/03	EF

REPORT NO. 01 REPORT: NPSP0200 DOC TYPE: PRATT

PARAMETERS: DOC TYPES - PRATT

PRER

PRPT

ang ei

1

STATUS: EF QU 5 YEARS ONLY:

PROCEDURE NUMBER	PROCEDURE TITLE	REV	EFFECT DATE	LAST REVIEW	NEXT REVIEW	ST
ATT-11.2	ATTACHMENT DIESEL AIR COMPRESSOR	002	05/11/01	04/03/98	04/03/03	EF
ATT-12.0	ATTACHMENT N2 PORVS	003	03/24/97	02/10/98	02/10/03	EF
ATT-13.0	ATTACHMENT NC	002	07/26/94	02/10/98	02/10/03	EF
ATT-14.0	ATTACHMENT NORMAL RHR COOLING	002	04/07/97	09/23/99	09/23/04	EF
ATT - 14.1	ATTACHMENT RHR COOL	005	01/08/02	05/01/98	05/01/03	EF
ATT - 14.2	ATTACHMENT RHR ISOL	001	07/26/94	02/10/98	02/10/03	EF
ATT-14.3	ATTACHMENT RHR NPSH	002	08/01/97	01/06/99	01/06/04	EF
ATT-14.4	ATTACHMENT RHR SAMPLE	001	07/26/94	01/06/99	01/06/04	EF
ATT-14.5	ATTACHMENT RHR SYSTEM	002	07/26/94	02/10/98	02/10/03	EF
ATT-14.6	ATTACHMENT RHR PRESS REDUCTION	001	01/14/99	01/14/99	01/14/04	EF
ATT-15.0	ATTACHMENT RCP START	008	09/14/01	03/17/00	03/17/05	EF
ATT-15.1	ATTACHMENT RCP DIAGNOSTICS	003	04/24/97	02/10/98	02/10/03	EF
ATT-15.2	ATTACHMENT SEAL COOLING	004	08/30/01	02/10/98	02/10/03	EF
ATT-16.0	ATTACHMENT RUPTURED S/G	011	07/18/01	01/11/00	01/11/05	EF
ATT-16.1	ATTACHMENT SGTL	001	07/18/01	09/08/00	09/08/05	EF
ATT-16.2	ATTACHMENT RCS BORON FOR SGTL	001	10/13/00	09/08/00	09/08/05	EF
ATT-17.0	ATTACHMENT SD-1	011	01/09/01	02/29/00	02/28/05	EF
ATT-17.1	ATTACHMENT SD-2	005	09/26/96	01/30/01	01/30/06	EF
ATT-18.0	ATTACHMENT SFP - RWST	004	10/08/97	02/10/98	02/10/03	EF
ATT-20.0	ATTACHMENT VENT TIME	003	07/26/94	02/10/98	02/10/03	EF
ATT-21.0	ATTACHMENT RCS ISOLATION	001	07/26/94	02/10/98	02/10/03	EF
ATT-22.0	ATTACHMENT RESTORING FEED FLOW	002	09/20/01	03/24/97	03/24/02	EF
ATT-23.0	ATTACHMENT TRANSFER 4160V LOADS	000	02/26/99	02/26/99	02/26/04	EF
ATT-24.0	ATTACHMENT TRANSFER BATTERY TO TSC	000	09/08/00	09/08/00	09/08/05	EF

REPORT NO. 01 REPORT: NPSP0200 DOC TYPE: PRATT			EOP A	GINNA NUCLEAR PROCEDURE TTACHMENTS						01/08/0	2 PAGE:	3	
PARAMETERS: DOC TYPE:	S - PRATT	PRER	PRPT	PRPTT	STATUS	5: EF	QU	5 YEARS	ONLY:				
PROCEDURE NUMBER	PROCEDURE T	TITLE						REV	EFFECT DATE	LAST REVIEW	NEXT REVIEW	ST	
ATT-26.0	ATTACHMENT	RETURN TO	NORMAL O	PERATIONS				000	10/31/01	10/31/01	10/31/06	EF	
TOTAL FOR PRATT	49												

(

ATT-	2.4 ATTACHMENT NO SW PUMPS PAGE 1 of	1
Thi	ponsible Manager <u>Allan</u> Date <u>1-8-200</u> 2 s attachment provides additional guidance if no service water ps are available.	
***	* * * * * * * * * * * * * * * * * * * *	**
	CAUTION	
REC	SYSTEM WILL NOT BE AVAILABLE FOR NORMAL SHUTDOWN COOLING OR SURCULATION. RCS COOLING MUST BE MAINTAINED USING THE SG AS THAT SINK.	
* * *	* * * * * * * * * * * * * * * * * * * *	***
1.	Trip both RCPs.	
2.	<u>IF</u> any D/G is running without adequate cooling, <u>THEN</u> perform the following:	
	a) Trip the affected D/G	
	b) Imemdiately depress voltage shutdown pushbutton.	
3.	Isolate letdown.	
4.	Direct an AO to align alternate cooling to both D/Gs using ER-D/G.2.	
5.	Direct an AO to align fire water cooling to the TDAFW pump using ATT-5.2, ATTACHMENT FIRE WATER COOLING TO TDAFW PUMP.	
6.	Refer to ER-AFW.1 for options for maintaining a source of fee flow to the SGs (consult Plant Staff if necessary).	d
7.	<u>IF</u> the plant fire water header is required to supply TDAFW pu cooling or CST makeup, <u>THEN</u> consider crosstie of city water hydrant to the plant fire water header (refer to SC-3.16.4.1)	-
8.	Secure CRFCs until SW can be restored for motor cooling.	
9.	Consider securing the following equipment until service water can be restored:	
	 SFP Pumps MFW Pumps MDAFW Pumps (TDAFW pump is preferred, if available) Condensate Pumps (Refer to T-5F) CCW Pumps (impact on thermal barrier) 	

OP: .	TITLE:	REV: 5
ATT-14.1	ATTACHMENT RHR COOL	PAGE 1 of 6
Respon	sible Manager Date <u>NOTE: Maintain operating RCP #1 seal DP greate</u> 220 psid.	
1.	Maintain RCS Temp < 350°F AND align the RHR system for shutdown operations as follows:	
2.	Open RHR Heat Exchanger bypass (HCV-626) isolat	ion valves:
	 V-712A V-712B 	
3.	Ensure closed the following valves:	
	 RHR PUMP DISCHARGE TO RX VESSEL DELUGE MOV-8 RHR PUMP DISCHARGE TO RX VESSEL DELUGE MOV-8 	
4.	Open RHR Pump discharge crosstie valves	
	 V-709C V-709D 	
5.	Open RHR PUMP DISCHARGE TO SI PUMP SUCTION MOV-	-857C
6.	Verify RHR PUMP SUCTION FROM RWST MOV-856 open	
	<u>NOTE: WHEN</u> the next step is performed, <u>THEN</u> An A-20 will light.	nnunciator
7.	Start one RHR Pump <u>AND</u> locally throttle open RI TO SI PUMP SUCTION valves MOV-857A and 857B to combined flow of < 1500 GPM as read on FI-931A	maintain
	 RHR Pump Started MOV-857A Throttled MOV-857B Throttled 	
8.	Throttle RHR Flow control valves to 50% open	
	 HCV-624 Throttled HCV-625 Throttled HCV-626 Throttled 	

9. <u>AFTER</u> the RHR Pump has run 10 minutes, <u>THEN</u> obtain a sample of RHR System to verify Boron Concentration is greater than RCS Boron Concentration. If not, continue running RHR Pump until RCS Boron Concentration is acceptable.

EOP:	TITLE: ATTACHMENT RHR COOL REV: 5
ATT-14.1	PAGE 2 of 6
<u>NOTE</u> :	<u>WHEN</u> the next step is performed, <u>THEN</u> Annunciator A-20 will extinguish.
10.	Stop the running RHR PUMP.
11.	Place RHR suction from RWST MOV-856 Key Switch to ON.
12.	Close RHR PUMP SUCTION FROM RWST MOV-856.
13.	Close RHR PUMP DISCHARGE TO SI PUMP SUCTION MOVS
	 MOV-857A MOV-857B MOV-857C
	<u>NOTE:</u> <u>DO NOT</u> remove fuses.
14.	Open the following breakers (Bkr):
	 MOV-857A (MCC C Pos 7M) Bkr MOV-857B (MCC D Pos 7M) Bkr MOV-857C (MCC C Pos 15J) Bkr
15.	Close RHR Flow control valves
	 HCV-624 HCV-625 HCV-626
16.	Close RHR PUMP SUCTION FROM CNMT SUMP B MOV-851A breaker (MCC C Pos 10M).
17.	Close RHR PUMP SUCTION FROM CNMT SUMP B MOV-851B breaker (MCC D Pos 10M).
18.	Close RHR PUMP SUCTION FROM CNMT SUMP B MOVs. IF MOV-851A

and/or MOV-851B will <u>NOT</u> close, <u>THEN</u> consult Plant Staff to determine if MOV-850A and/or MOV-850B should be closed. L

- MOV-851A
- MOV-851B

NOTE: DO NOT remove fuses.

19. Open RHR PUMP SUCTION FROM CNMT SUMP B MOV-851A breaker (MCC C Pos 10M).

[EOP:	TITLE:	REV:	5	
	ATT-14.1	ATTACHMENT RHR COOL	DACE	- 3 of	6
			PAGE	3 01	6

- 20. Open RHR PUMP SUCTION FROM CNMT SUMP B MOV-851B breaker (MCC D Pos 10M).
- 21. <u>WHEN</u> Primary System pressure reaches 350 to 360 psig, <u>THEN</u> perform the following:
- 22. To prevent flashing in the CCW System, start a second Component Cooling Water Pump and put a second Component Cooling Water Heat Exchanger into service.

<u>NOTE</u>: IF FI-619 (PPCS point F0619) is > 4900 gpm, <u>THEN</u> notify the Shift Supervisor (Flow induced vibration concern).

- 23. With two CCW HX's in service, ensure CCW flow is \leq 4900 gpm.
- 24. Control RCS pressure using PRZR heaters and spray as follows:
- 24.1 <u>IF</u> at least one RCP is running, <u>THEN</u> reduce RCS pressure to approximately 325 psig and stabilize pressure.
- 24.2 <u>IF NO RCP running, THEN</u> stabilize RCS pressure between 350 and 360 psig.
- 25. Enable LTOP RCS pressure alarms associated with Annunciator F-29 as follows:
- 25.1 Replace annunciator window F-29 with LTOP RCS pressure alarm window.
- 25.2 On PPCS, substitute a value of one (1) for point ID KPLTOP.
- 25.3 Substitute a value for P0420 or P0420A greater than 390 psig.
- 25.4 Verify that annunciator F-29 alarms.
- 25.5 Restore selected point to processing.
- 25.6 Verify that annunciator F-29 clears.
- 25.7 Substitute a value for P0420 or P0420A less than 300 psig.
- 25.8 Verify that annunciator F-29 alarms.
- 25.9 Restore selected point to processing.
- 25.10 Verify that annunciator F-29 clears.

ļ	EOP:	TITLE:	REV:	5			
	ATT-14.1	ATTACHMENT RHR COOL		-			
			PAGE	4	of	6	

- 26. Open CCW to RHR HX A MOV-738A.
- 27. Open CCW to RHR HX B MOV-738B.

<u>NOTE</u>: <u>IF</u> FI-619 (PPCS point F0619) is > 4900 gpm, <u>THEN</u> notify the Shift Supervisor (Flow induced vibration concern).

- 28. <u>AFTER MOV-738A and MOV-738B are open</u>, verify CCW flow is \leq 4900 gpm on FI-619.
- 29. Verify LOW PRESS LTDN PRESS PI-135 PCV-135 setpoint set to 300 psig.
- 30. Open RHR HX BYPASS HCV-626 to 25% to ensure RHR System pressure equalization.
- 31. Station an Auxiliary Operator at RHR pressure indicator PIC-629 (South of Spent Fuel Pool Pump A).
- 32. Ensure CVCS letdown aligned up to PCV-135.
- 33. <u>SLOWLY</u> open RHR LETDOWN TO CVCS HCV-133 to 100% to fill <u>AND</u> pressurize the RHR system.
- 34. Verify RHR pressure (PIC-629) is within 200 psig of RCS pressure (P-420 or P-420A).
- 35. Remove <u>AND</u> reinsert control power fuses for RHR PUMP SUCTION FROM LOOP A HOT LEG MOV-700. (MCC C Pos 7F)
- 36. Close MOV-700 breaker (MCC C Pos 7F).
- 37. Remove <u>AND</u> reinsert control power fuses for RHR PUMP SUCTION FROM LOOP A HOT LEG MOV-701. (MCC D Pos 7F)
- 38. Close MOV-701 breaker (MCC D Pos 7F).
- 39. Open RHR PUMP SUCTION FROM LOOP A HOT LEG MOVs.
 - MOV-701
 - MOV-700
- 40. Verify closed RHR HX flow control valves.
 - HCV-626
 - HCV-625
 - HCV-624

-			
	EOP:	TITLE:	REV: 5
	ATT-14.1	ATTACHMENT RHR COOL	
			PAGE 5 of 6

NOTE :	It may	be necessary to close down PCV-135 following
	-	RHR Pump start to maintain < 70 gpm Letdown flow.
		This can be done by raising PCV-135 AUTO setpoint
		OR taking MANUAL control of PCV-135 AND closing.

- <u>NOTE</u>: PI-135 may read 100 psi greater than PI-420 due to RHR Pump shutoff head.
- NOTE: Annunciator A-20 will light.
- 41. Start one RHR PUMP.
 - <u>NOTE:</u> <u>DO NOT</u> run two (2) RHR pumps with the discharge crossties open <u>AND</u> flow < 1200 gpm.
- 42. Adjust Low Press LTDN Press PCV-135 to establish desired Letdown flow (FI-134).

<u>NOTE</u>: PCV-135 (Letdown flow) determines the amount of flow during this temperature equalization.

- 43. Maintain flow at a minimum through HCV-624 and HCV-625 for 5 minutes to equalize the temperature of the RHR Loops.
- 44. Perform the following to establish the RHR System as a heat sink and secure the Steam Generators as heat sinks:

<u>NOTE</u>: To prevent flashing in the CCW System, ensure 2 CCW Pumps and 2 CCW Heat Exchangers are in service.

- 44.1 Remove <u>AND</u> reinsert control power fuses for RHR PUMP DISCHARGE TO LOOP B COLD LEG MOV-720.
- 44.2 Close MOV-720 breaker (MCC C Pos 7C).
- 44.3 Remove <u>AND</u> reinsert control power fuses for RHR PUMP DISCHARGE TO LOOP B COLD LEG MOV-721.
- 44.4 Close MOV-721 breaker (MCC D Pos 7C).

EOP:	ITLE:	REV: 5
ATT-14.1	ATTACHMENT RHR COOL	PAGE 6 of 6

- 44.5 Open RHR PUMP DISCHARGE TO LOOP B COLD LEG.
 - MOV-720
 - MOV-721
- 44.6 Manually increase RHR flow and adjust HCV-624, HCV-625, and HCV-626; while simultaneously reducing Steam Generator feeding <u>AND</u> steaming rate to control RCS temperature.

<u>NOTE</u>: Maximizing feeding and steaming during subsequent cooldown on RHR will assist in SG cooling, and allow access as soon as possible.

- 44.7 <u>WHEN</u> Steam Generator feeding <u>AND</u> steaming has been reduced to the desired rate or secured, <u>THEN</u> continue increasing RHR flow <u>AND/OR</u> adjust HCV-624, HCV-625, and HCV-626 as necessary to establish the desired cooldown rate.
- 44.8 Readjust Low Press LTDN Press PCV-135 to re-establish desired letdown flow.

<u>NOTE</u>: FI-626 flow indication will be lost during reset of flow alarm.

- 44.9 Notify I&C to reset RHR flow alarm to 400 gpm.
- 44.10 <u>WHILE</u> I&C resets the RHR flow alarm, <u>THEN</u> place RHR HX BYPASS HCV-626 in MANUAL.
- 44.11 Open RHR LETDOWN TO CVCS HCV-133.