GEORGIA POWER COMPANY
INSERVICE TEST PROGRAM

(ISI-P-008)

FOR

VOGTLE ELECTRIC GENERATING PLANT
UNIT 1

PREPARED BY
SOUTHERN NUCLEAR OPERATING COMPANY
INSPECTION AND TESTING SERVICES GROUP

REV	DATE	DESCRIPTION	SNC				GPC	
			PREP'D BY (ITS)	REV'D BY (ITS)	APPV. BY (ITS)	APPV. VOGTLE PROJECT NMS	APPV MGR. TECH SUPP	APPV GEN. MGR.
0	6/30/86	ISSUED FOR PST/IST INSPECTION						
1	10/21/88	REVISED PER NRC COMMENTS PRESSURE TESTS						
2	5/1/87	GENERAL UPDATE COMMITMENTS						
3	11/9/87	REVISED RHR TESTING RR-52, 53, 54						
4	9/7/88	INCORPORATE PCRS 88-005, 88-006, AND 88-007						
5	2/5/90	REFER TO REVISION 5 SUMMARY OF CHANGES						
6	2/28/91	REFER TO REVISION 6 SUMMARY OF CHANGES						
7	3/22/93	REFER TO REVISION 7 SUMMARY OF CHANGES						
8	3/30/94	INCORPORATE PCRS 93-008, 93-009, 93-013, 93-023, AND 93-025	DLJ	DMS	MB	JLP	DNA	ABB

VOGTLE ELECTRIC GENERATING PLANT - UNIT 1
INSERVICE TEST (IST) PROGRAM

ISI-P-008

Revision 8 Summary of Changes

List of Effective Pages	Revised to indicate the current revision number of each page in the program document. See below for pages affected.
Drawings ISI-D-221 & ISI-D-222	Revised per PCR 93-008. (CVCS Section)
Figures 3f-1 and 3f2.	Revised per PCR 93-009. (CVCS Section)
Page 4-22	Revised Valve Test List to indicate a change in test frequency for valve HV8804B from quarterly to a cold shutdown frequency per PCR 93-023.
Page 4-23	The Valve Test List was revised to show RHR check valves 1-1205-U6-001 and 002 to be partially stroke exercised quarterly per PCR 93-013.
Page 6-35	Cold Shutdown Justification CS-35 withdrawn per PCR's 93-013 and 93-025.
Page 6-36	Cold Shutdown Justification CS-36 rewritten per PCR 93-013.
Page 6-41	Added Cold Shutdown Justification CS-41 to justify testing valve HV8804B at cold shutdown frequency per PCR 93-023.

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DISTRIBUTION LIST

HOLDER	MANUAL NUMBER
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L. K. Mathews	24
Deleted	28
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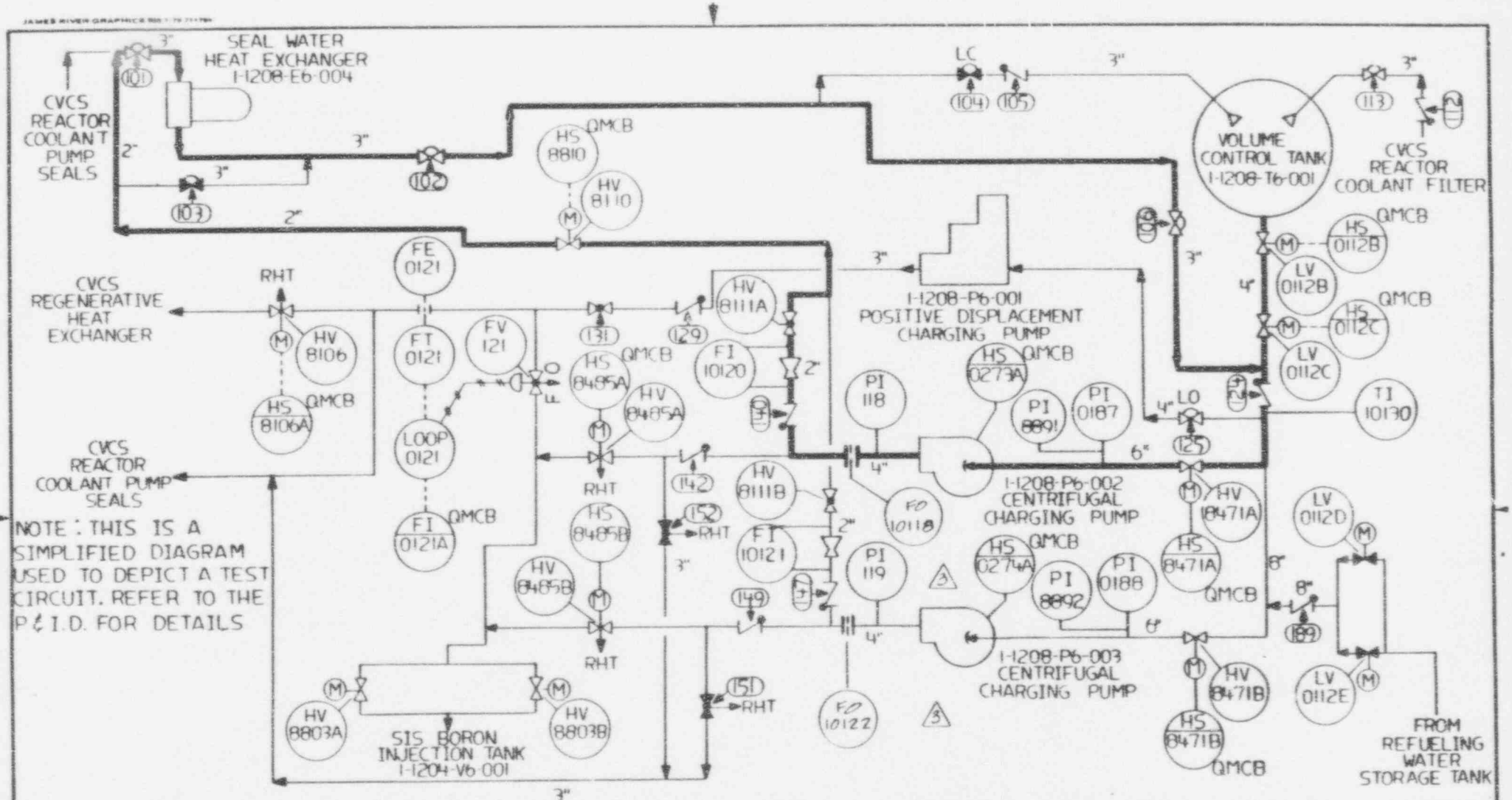
Performance Supervisor	30



REV.	DATE	BY	CHK'D	DESCRIPTION	APPR. 1	APPR. 2	APPR. 3	APPR. 4	APPR. 5
0	5-24-89	[illegible]	WS	ISSUED FOR PST	[illegible]				
1	7-14-89	[illegible]	CWR	UPDATED TO IX4D8116-2 REV. 10	DRC				
2	6-14-88	DRC	WS	ADDED PI 8891, 8892	W/H	MB			
3	12-16-92	WS	DRC	ADDED FO-10118 AND FO-10122.	MB				

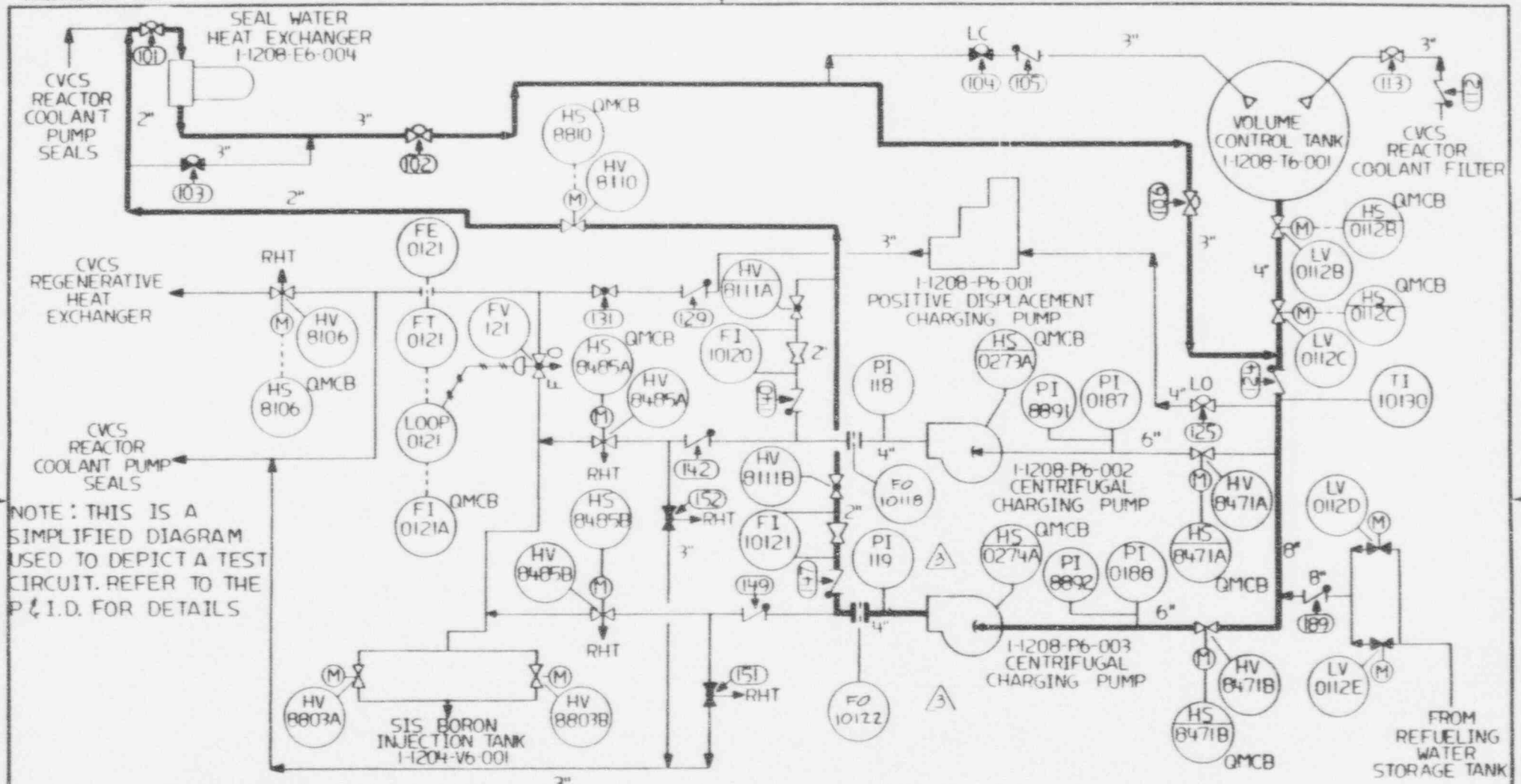
REMARKS

Southern Company Services, Inc. FOR Georgia Power Company

VOGTLE ELECTRIC GENERATING PLANT
UNIT 1
PUMP INSERVICE TESTING LOOP
FOR CENTRIFUGAL CHARGING PUMP
1-1208-P6-002

DESIGNED	FT	DRAWN	DRC
TYPED		CHECKED	WS
SCALE	NONE	CONTINUED ON SHEET	

PROJ. I.D.	DRAWING NUMBER	SHEET	REV
N/A	N/A	1SI-D-221	1 OF 1	3



REV.	DATE	BY	CHK'D	DESCRIPTION	APPR. 1	APPR. 2	APPR. 3	APPR. 4	APPR. 5
0	5-24-84	[illegible]	WS	ISSUED FOR PST	[illegible]				
1	7-29-86	[illegible]	CLA	UPDATED TO IX4DB116-2 REV. 10	[illegible]				
2	6-16-88	[illegible]	WS	ADDED PI 8891, 8892	NLA	MB			
3	12-16-93	WS	DRG	ADDED FO-10118 AND FO-10122	MB				

REMARKS

Southern Company Services, Inc. FOR Georgia Power Company

VOGTLE ELECTRIC GENERATING PLANT
UNIT 1
PUMP INSERVICE TESTING LOOP
FOR CENTRIFUGAL CHARGING PUMP
1-1208-P6-003

DESIGNED	FT	DRAWN	DRC
TYPED		CHECKED	WS
SCALE	NONE	CONTINUED ON SHEET	

PROJ. I.D.	DRAWING NUMBER	SHEET	REV
N/A	N/A	ISI-D-222	1 OF 1	3

PACIFIC PUMPS | DRESSER HUNTINGTON PARK, CALIFORNIA

CONTRACTOR WESTINGHOUSE

CUSTOMER WESTINGHOUSE

ITEM NO. GRE-81/2 P.O. MN-73893-D

IMPELLER PATTERN	M-8863	M-8864
MAXIMUM DIAMETER	8.25	8.25
RATED DIAMETER	8.25	8.25
MINIMUM DIAMETER	7.25	7.25

ORIGINAL

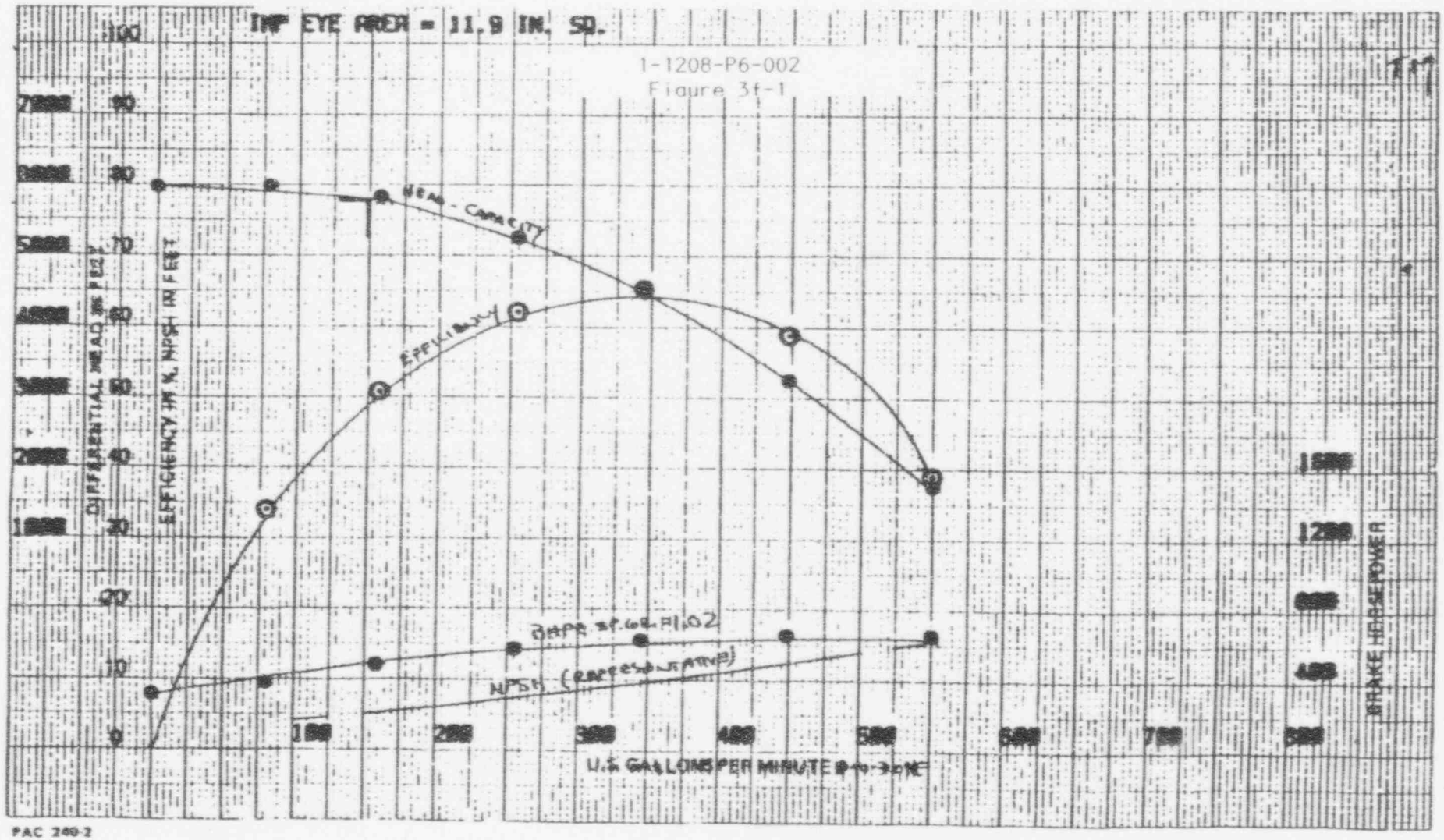
TEST PERFORMANCE CURVE NO. 52233/4

SIZE 2.5" ML TYPE IJ STAGES 11

R.P.M. 4820 DATE 10/24/86

PUMP NUMBER 52233/4

PERFORMANCE ALSO APPLIES TO PUMP NUMBER NE-91063



PAC 240-2

Doc. No. 262-NH-43258SP2

DRESSER PUMP DIVISION — DRESSER
Huntington Park, CALIFORNIA

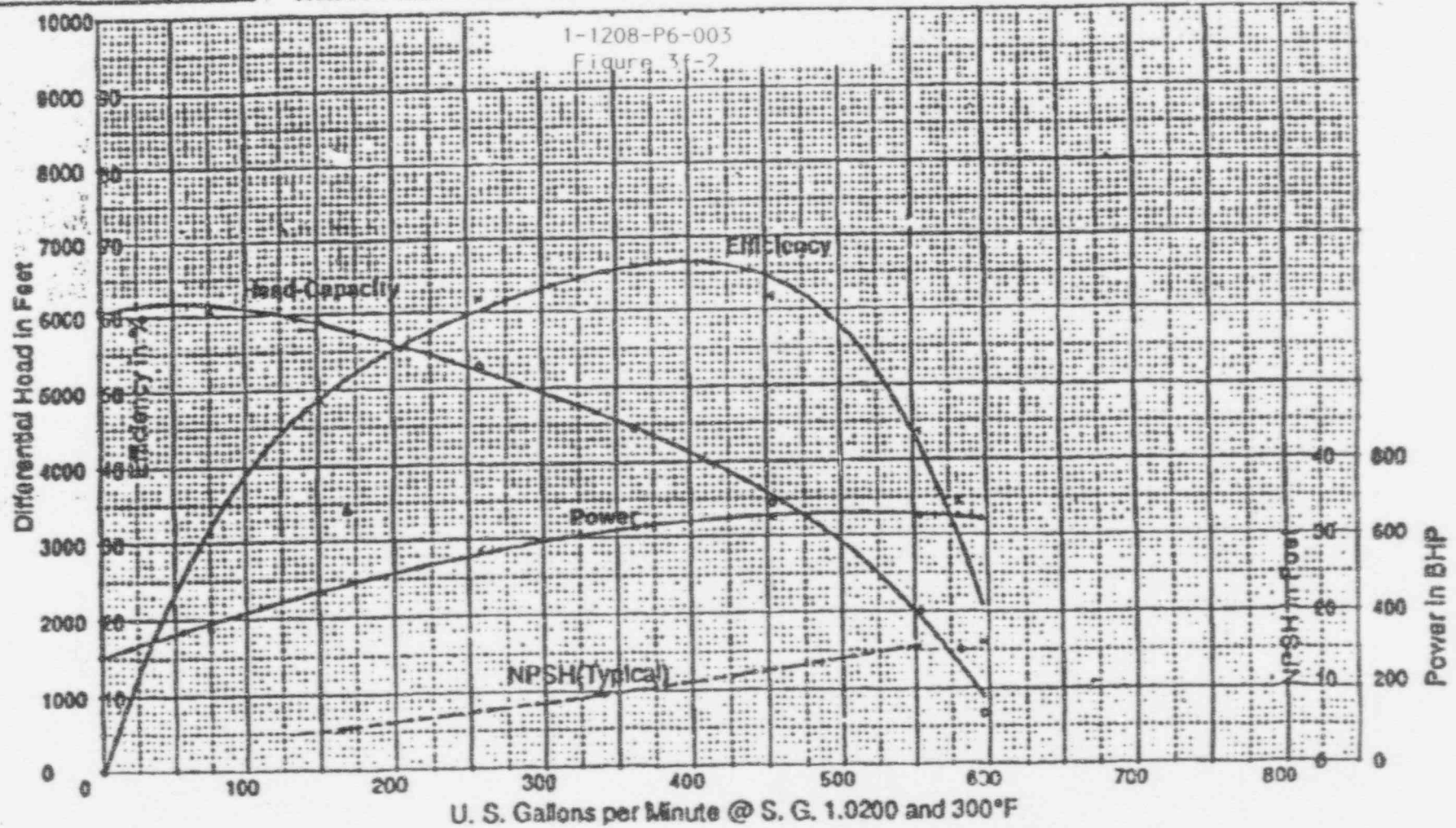
Test Engr.	
Witness	

Contractor
Customer Westinghouse
Item No. CSAPCH
P. O. No. MA-49487-D
Pump Serial Number 38033-SP2
Curve Number 38033-SP2
Ref. Job B-50033; s/n 52233/4

Size 2.5 BL Type U Stages 11 R.P.M. 4817
Date 6/19/92 Impeller Eye Area (sq. In.) 12.37

	Suction	Radial
Impeller Pattern	M-7278	M-6534
Maximum Diameter (In.)	8.250	8.250
Rated Diameter (In.)	8.1875	8.1875
Minimum Diameter (In.)	7.250	7.250

1-1208-P6-003
Figure 3f-2



Valve Number	Class ISI	Class Proj.	P&ID (Coord.)	Valve Size Cat	Valve Size (in.)	Valve Size Type	Act. Type	Position Norm	Position Fail	Position Safety	Act. or Pass.	Tests and Freq. PI	Tests and Freq. ET	Tests and Freq. ST	Tests and Freq. FSV	Tests and Freq. LT	Relief Req. or C. S. Just.	Description and Notes
HV 8716A	2	212	1X4DB122 (F-7)	B	8.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR Train A Hot Leg Isolation
HV 8716B	2	212	1X4DB122 (D-7)	B	8.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR Train B Hot Leg Isolation
HV 8804A	2	212	1X4DB122 (F-8)	B	8.00	GA	MO	C	AI	O/C	A	Y	CS	CS			CS-39 RR-2	RHR Heat Exchanger (HX) Train A to CVCS Charge Pump Suction
HV 8804B	2	212	1X4DB122 (B-8)	B	8.00	GA	MO	C	AI	O/C	A	Y	CS	CS			CS-41 RR-2	RHR HX Train B to Safety Injection Pump Suction
HV 8811A	2	212	1X4DB122 (B-3)	B	14.00	GA	MO	C	AI	O/C	A	Y	Q	Q				Containment Sump Isolation
HV 8811B	2	212	1X4DB122 (B-3)	B	14.00	GA	MO	C	AI	O/C	A	Y	Q	Q				Containment Sump Isolation
HV 8812A	2	212	1X4DB122 (F-4)	B	12.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR PumpP6-001 Inlet From RWST
HV 8812B	2	212	1X4DB122 (C-4)	B	12.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR Pump P6-002 Inlet From RWST
PSV 8708A	2	212	1X4DB122 (H-3)	C	3.00	SR	S	C	N/A	O/C	A		T					RHR Pump P6-001 Inlet
PSV 8708B	2	212	1X4DB122 (E-3)	C	3.00	SR	S	C	N/A	O/C	A		T					RHR Pump P6-002 Inlet

Valve Number	Class ISI	Class Proj.	P&ID (Coord.)	Valve Size Cat	Valve Size (in.)	Valve Size Type	Act. Type	Position Norm	Position Fail	Position Safety	Act. or Pass.	Tests and Freq. PI	Tests and Freq. ET	Tests and Freq. ST	Relief FSV	Relief LT	Req. or C. S. Just.	Description and Notes
U4 122	2	212	1X4DB122 (C-3)	C	14.00	CK	S	C	N/A	O/C	A		Q					RHR Sump Suction (Note 3)
U4 123	2	212	1X4DB122 (B-3)	C	14.00	CK	S	C	N/A	O/C	A		Q					RHR Sump Suction (Note 3)
U6 001	2	212	1X4DB122 (F-4)	C	12.00	CK	S	C	N/A	O/C	A		PQCS				CS-36 RR-2	RWST to RHR Pump Suction
U6 002	2	212	1X4DB122 (C-4)	C	12.00	CK	S	C	N/A	O/C	A		PQCS				CS-36 RR-2	RWST to RHR Pump Suction
U6 009	2	212	1X4DB122 (G-5)	C	8.00	CK	S	C	N/A	O	A		PQCS				CS-37 RR-2	RHR Pump P6-001 Discharge Check
U6 010	2	212	1X4DB122 (D-5)	C	8.00	CK	S	C	N/A	O	A		PQCS				CS-37 RR-2	RHR Pump P6-002 Discharge Check
FV 0610	2	212	1X4DB122 (H-5)	B	3.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR Pump P6-001 Miniflow
FV 0611	2	212	1X4DB122 (E-5)	B	3.00	GA	MO	O	AI	O/C	A	Y	Q	Q				RHR Pump P6-002 Miniflow

COLD SHUTDOWN JUSTIFICATION

CS-35

SYSTEM: Residual Heat Removal - System No. 1205

VALVE(S): 1205-HV-8716A, 1205-HV-8716B

CATEGORY: B

CLASS: 2

FUNCTION: These valves are used as necessary to align the residual heat removal system.

QUARTERLY TEST REQUIREMENT: Exercise and Time.

COLD SHUTDOWN TEST JUSTIFICATION: The Westinghouse plant ECCS analysis assumes low-head safety injection into all four cold legs. The analysis also assumes that one residual heat removal pump may fail to operate during an accident. If one pump fails, the other pump is required to inject into all four cold legs. This requires that valves HV-8716A and HV-8716B be open to support injection into all four cold legs. Closing these valves for surveillance testing during plant operation will place the plant in an unanalyzed condition outside its established design basis assuming failure of one pump.

QUARTERLY PARTIAL STROKE TESTING: None

COLD SHUTDOWN TESTING: Exercise and Time.

Testing of these valves is now performed on a quarterly frequency. Therefore, GPC has withdrawn this Cold Shutdown Justification.

COLD SHUTDOWN JUSTIFICATION

CS-36

SYSTEM: Residual Heat Removal - System No. 1205

VALVE(S): 1205-U6-001, 1205-U6-002

CATEGORY: C

CLASS: 2

FUNCTION: These check valves open to allow flow from the refueling water storage tank to the residual heat removal pumps. These valves close to prevent reverse flow to the refueling water storage tank.

QUARTERLY TEST REQUIREMENT: Verify forward flow operability and reverse flow closure.

COLD SHUTDOWN TEST JUSTIFICATION: During normal operation, the RHR pumps cannot overcome RCS operating pressure. Forward flow operability of these normally closed check valves during normal operation can be verified only by aligning the RHR system to circulate water to and from the RWST. However, this alignment provides only partial flow through the check valves. Reverse flow closure will be verified quarterly.

QUARTERLY PARTIAL STROKE TESTING: These valves will be partial stroke exercised quarterly.

COLD SHUTDOWN TESTING: These valves will be tested during cold shutdown. The maximum required flowrate through each valve will be verified.

GENERIC LETTER 89-04 REVIEW: This justification complies with the full-stroke testing requirements for check valves as described in position 1 of Generic Letter 89-04.

COLD SHUTDOWN JUSTIFICATION

CS-41

SYSTEM: Residual Heat Removal - System No. 1205

VALVE: 1205-HV-8804B

CATEGORY: B

CLASS: 2

FUNCTION: This normally closed valve opens to provide a flow path to the suction of the SI pumps from the RHR system. While closed it directs flow from the RHR pumps to the RCS for low pressure injection and shutdown cooling.

QUARTERLY TEST REQUIREMENT: Exercise and Time (IWV-3412 and IWV-3413)

COLD SHUTDOWN TEST JUSTIFICATION: Testing this valve during normal operation requires defeating the associated ECCS interlocks. To defeat the interlock, a jumper must be installed across energized terminals. Installation of electrical jumpers across energized terminals during normal operation is undesirable because of the possibility of shorting the terminals and causing undesirable effects.

In addition, during the time the valve is opened and coincident with a small break LOCA the potential to overpressurize the SI suction piping exists. With the valve open and coincident with a large break LOCA and one or both RHR pumps running the potential exists to runout either or both of the RHR pumps. Either one of these cases could cause component damage and place the plant in an undesirable condition.

QUARTERLY PARTIAL STROKE TESTING: None for same reasons provided above.

COLD SHUTDOWN TESTING: Exercise and Time

ENCLOSURE 2
(REVISION 5 TO VEGP-2 IST PROGRAM DOCUMENT ISI-P-016)

TO

GEORGIA POWER COMPANY
LETTER LCV-0389,
"REVISIONS TO INSERVICE INSPECTION PROGRAMS"

VOGTLE ELECTRIC GENERATING PLANT
NRC DOCKET NOS. 50-424, 50-425