

VOGTLÉ ELECTRIC GENERATING PLANT

GEORGIA POWER CO

MAINTENANCE WORK ORDER REVISION SHEET

1 CONTROL NO. 19007576	2 REVISION NO. 1	3 MPL TAG NO. 1-2403-G4-001 1-2403-P5-DG2	4 DATE 3/30/90
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5 REASON FOR REVISION
 PAV BLOCK 23 SEE NEW WORK INSTRUCTIONS
 (ATTACHED) PAGES 3 of 4 & 4 of 4

6 INITIATOR Billy Smith Bill Smith 4203	7 MAINTENANCE ENG NA 3-30-90	8 OPERATIONS NA 3-30-90	9 CLEARANCE REQUIRED NO
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10 GC REVIEW NA 3-30-90	11 HOLD POINTS no additional hold pts. required
12 HP REVIEW NA 3-30-90	13 NEW RWP REQUIRED NONE
14 ANI REVIEW NA 3-30-90	15 HOLD POINTS NA
16 WORK PLANNER Bill Smith 3/30/90	17 PROCEDURES NONE
18 FIRE PROTECTION REVIEW NO Bill Smith 3/30/90	19 SUPERVISOR [Signature] 3/30/90

20 REMARKS

WORK INSTRUCTIONS:

CAUTION

ALL PERSONNEL INVOLVED IN THE TESTING MUST READ AND UNDERSTAND THE ATTACHED CAUTION STATEMENT. DURING THE ENGINE START AND SUBSEQUENT TESTING IF ANY TRIPS OCCUR OTHER THAN PLANNED TRIPS OR OBSERVE OTHER SIGNIFICANT MALFUNCTION, STOP THE TEST AND NOTIFY IIT TEAM. TEST WILL NOT CONTINUE WITHOUT THE CONCURRENCE FROM IIT TEAM MEMBER. ANY PORTION OF THE TESTING THAT COULD IMPACT THE RELIABILITY AND SAFETY OF THE D/G SYSTEMS MUST BE EVALUATED BY GA POWER COMPANY PRIOR TO TESTING. IF A TEST NEEDS TO BE STOPPED, ENSURE ALL EQUIPMENT IS PLACED IN A SAFE POSITION.

PERFORM ENGINE LOGIC TESTING PER PROCEDURE 27563-C, REV 2. COOPER ENERGY SERVICES PERSONNEL WILL BE PERFORMING APPLICABLE PORTIONS OF THE PROCEDURE WITH ASSISTANCE FROM GPC PERSONNEL, AS REQUIRED. THE ELECTRICAL PORTIONS OF THE PROCEDURE NEED NOT BE RETESTED. ADDITIONAL INSTRUMENTATION MAY BE CONNECTED BY TEST PERSONNEL TO AID IN TROUBLESHOOTING ANY INSTRUMENTATION CONNECTED OR ADJUSTMENTS MADE SHALL BE DOCUMENTED COMPLETE ON THIS MWO. DOCUMENT ANY PROBLEMS ENCOUNTERED WHILE PERFORMING THIS TEST.

NOTE:

PRELUBE THE TURBOCHARGER PRIOR TO EACH START. TURN ALL 3 VIDEO CAMERAS AND RECORDERS TO RECORD THE ANNUNCIATORS AND OTHER ENGINE & GENERATOR PARAMETERS.

STEP 1: FOLLOWING THE LOGIC TEST THE ENGINE WILL BE STARTED IN THE EMERGENCY MODE AND A LEAK TEST PERFORMED ON THESE LINES.

- E-10A - TRIP LOW PRESSURE LUBE OIL
- B " " " " "
- C " " " " "
- E-16A - TRIP HIGH TEMPERATURE JACKET WATER
- B " " " " "
- C " " " " "
- E-68 - TRIP HIGH PRESSURE CRANKCASE
- E-92 - TRIP LOW PRESSURE TURBO OIL
- E-14 - TRIP LOW PRESSURE JACKET WATER
- E-23H - TRIP HIGH VIBRATION
- E-19 - TRIP HIGH TEMPERATURE ENGINE BEARINGS
- E-18 - TRIP HIGH TEMPERATURE LUBE OIL.

AFTER RECONNECTING THE LINES FOLLOWING THE TEST, PERFORM LEAK DETECTION BY SNOOP DETECTOR AND FIX ANY LEAKS.

TEST FOR LEAKAGE BY DISCONNECTING TUBING AT CONTROL PANEL BULKHEAD AND CONNECTING PNEUMATIC BUBBLE TESTER. OBSERVE TESTER FOR AIR FLOW WHEN LINE IS PRESSURIZED. RESTORE TUBING CONNECTION AT BULKHEAD AND CONTINUE WITH NEXT INSTRUMENT LINE.

STARTING TIME BETWEEN EACH START MUST BE AT LEAST 10 MIN. RECORD THE TIME IN WORKORDER.

Nuclear Plant Maintenance Work Order Continuation Sheet

pg # 1 of 5

MPL No. 1-2403-PS-DG2

MWO No. 19001576

Work Description BLOCK 27 PROCEDURE VEGP 27563-C

CAP LINES E-16A, B, C AND E18 TO ALLOW SENSORS TO BE CALIBRATED -
OPEN LINK F10 TO DEENERGIZE DISABLED DG CKT BRK
INOPERABLE ANNUNCIATOR WINDOW

4.1.14 131.8 VOLTS DC READ

DISCONNECTED HORN WIRE # 402 *Dis. Request 3/29/80*

4.2.31 Per request from Engineering, timed group II lockout signal from when start was initiated 63 seconds, satisfactory.

4.2.37 Repeated group II lockout time, 65 sec., satisfactory. Repeated one more time, 63 seconds, satisfactory. Group II lockout timer is consistent. *TJH 3-27-80*

4.2.421 CLOSED LINKS L25 & L26 TO PERFORM STEP

RECONNECTED TUBES TO E-16A, B, C AND E-18

Mark Dwyer 3-29-80

Block 23 cont) Maintain Zone II Housekeeping. *AKB 4-1-81*

Nuclear Plant Maintenance Work Order Continuation Sheet

pg. 2 of 5

MPL No. 1-2403-P5-DG2

MWO No. 19001576

Work Description BLOCK 27

PROCEDURE YEGP 27563-C

WHILE ENGINE RUNNING IN EMERGENCY MODE A BUBBLE TEST WAS CONDUCTED ON THE PNEUMATIC LINES LISTED BELOW. AFTER RECONNECTING PNEUMATIC LINES, A SNOOP TEST WAS CONDUCTED ON FITTING. ONE HIGH TEMP JACKET WATER SENSOR TRIPPED AFTER ENGINE STARTED.

BUBBLE TEST SNOOP TEST

		BUBBLE TEST	SNOOP TEST
E-10A	TRIP LOW PRESSURE LUBE OIL	SATISFACTORY	SATISFACTORY
E-10B	TRIP LOW PRESSURE LOBE ON	SATISFACTORY	SATISFACTORY
E-10C	TRIP LOW PRESSURE LUBE OIL	SATISFACTORY	SATISFACTORY
E-68	TRIP HIGH PRESSURE CRANKCASE	SATISFACTORY	SATISFACTORY
E-42	TRIP LOW PRESSURE TURBO OIL	1 BUBBLE/SECOND	WEEPS
-14	TRIP LOW PRESSURE JACKET WATER	SATISFACTORY	HAS BUBBLES
C-23H	TRIP HIGH VIBRATION	2 BUBBLES/SECOND	WEEPS
E-19	TRIP HIGH TEMP ENG BRGS	1 BUBBLE/SECOND	SATISFACTORY
E-18	TRIP HIGH TEMP LUBE OIL	SATISFACTORY	WEEPS
E-16C	TRIP HIGH TEMP JACKET WATER	TRIPPED ENGINE	DID NOT PERFORM
		3 BUBBLES/SECOND	
E-16A	TRIP HIGH TEMP JACKET WATER	SATISFACTORY	DID NOT PERFORM

1020

ADDED PRESSURE GAUGES AT SENSORS OF LINES E-16A, B, C FOR TROUBLE SHOOTING TO OBSERVE SENSOR OPERATION DURING ENGINE STARTING. FOUND SENSOR A MOVEMENT SWISH.

STEP #	TRIP BY	SNOOP TEST	SNOOP TEST
STEP # 2	TRIP BY HI-TEMP LUBE OIL	SATISFACTORY	SATISFACTORY
STEP # 3	TRIP BY HIGH VIBRATION	SATISFACTORY	SATISFACTORY
STEP # 4	TRIP BY HIGH PRESS CRANKCASE	SATISFACTORY	SATISFACTORY
STEP # 5	TRIP BY 2 OF 3 LO. PRESSURE	SATISFACTORY	SATISFACTORY

E-16A, E-16B & E-16C REQUIRE BUBBLE TESTING

Lowell P. ... 3/31/90 12:06 AM

Nuclear Plant Maintenance Work Order Continuation Sheet

MPL No. 12402G4001/12304P5P2

MWONo. 19091576

pg. # 3 of 5 HDP 2/1/90

Work Description Block 27

MULTIPLE STARTS WITH AIR COMPRESSORS OFF

AIR COMP #1 OFF TIME 22:30

AIR COMP #2 OFF TIME 22:30

STARTING AIR PRESSURE

AIR RECEIVER #1

AIR RECEIVER #2

TIME

PI-9060

PI-9064

STEP # 2

START 22:35

240 PSI

240 PSI

STOP 22:42

330 PSI

220 PSI

STEP # 3

START 23:55

220 PSI

220 PSI

STOP 23:00

200 PSI

200 PSI

STEP # 4

START 23:13

200 PSI

200 PSI

STOP 23:17

185 PSI

185 PSI

STEP # 5

START 23:29

185 PSI

185 PSI

STOP 23:34

170 PSI

170 PSI

AIR COMP #1 START TIME 23:36

AIR COMP #2 START TIME 23:36

Block 26 cont) WP steps of

Recorded by H. Dennis 3/31/90

MPL No. 1-2403-P5-DG2

MWO No. 19001576

Work Description BLOCK 27

PROCEDURE VEGP 27563-C

PRESSURE GAUGE INSTALLED TO MONITOR PILOT PRESSURE OF PILOT VALVE P3. THIS WAS DONE IN CONJUNCTION WITH MWO 19001684 TO MONITOR PRESSURE DURING SENSOR TRIP TEST. DRP 3/31/90 1900 HRS

PILOT PRESSURE 46.287 REACHED WITH TWO JACKET WATER HIGH TEMP SENSORS.

↓ 6 56 PSI ↓ ↓ LOW PRESSURE ^{DRP 3/31/90} JACKET WATER SENSOR

DECONNECTED. DRP 3/31/90 2024 HRS

HIGH TEMP JACKET WATER SENSORS A & B CHANGED OUT. ^{DRP 3/31/90}

WHILE ENGINE SHUTDOWN A BUBBLER TEST WAS CONDUCTED ON THE FOLLOWING PNEUMATIC LINES.

E-16A	TRIP HIGH TEMP JACKET WATER	:	1 BUBBLE / SECOND
E-16B	↓ ↓ ↓ ↓ ↓	:	SATISFACTORY
E-16C	↓ ↓ ↓ ↓ ↓	:	SATISFACTORY

WHILE ENGINE RUNNING IN ~~EMERGENCY~~ ^{DRP TO NORMAL} MODE A BUBBLER TEST WAS CONDUCTED ON THE FOLLOWING PNEUMATIC LINES: A SWEEP TEST WAS DONE ON THE FITTING BAKE FOR BUBBLER TEST.

		BUBBLER TEST	SWEEP TEST
E-16A	TRIP HIGH TEMP JACKET WATER	1 BUBBLE / SECOND	SAT.
E-16B	↓ ↓ ↓ ↓ ↓	1 BUBBLE / 5 SECONDS	SAT.
E-16C	↓ ↓ ↓ ↓ ↓	SATISFACTORY	SAT.

DRP 3/31/90

Nuclear Plant Maintenance Work Order Continuation Sheet

Pg. # 5.85

MPL No. 1-2403-6+C01 / 1-2403-PS-062

MWO No. 9001576

Work Description BK 26) Ray Moore 3-30-90

MWD No: 19001576

QC HOLD / WITNESS POINTS
PROCEDURE & REV No: 257 27563-C 1/2

85010-C FIG. 1
PAGE 1 OF 1

NOTIFY QUALITY CONTROL PRIOR TO PERFORMING THE WORK ACTIVITY
OR STEP ASSOCIATED WITH THE HOLD (H) OR WITNESS (W) POINT
DO NOT BYPASS QC HOLD OR WITNESS POINTS

STEP NO.	H/W	HOLD POINT / WITNESS POINT DESCRIPTION	ASSIGNED BY		NOTIFIED		QC ACTION	
			INIT	DATE	INIT	DATE	INIT	W/N/A
	H	Notify QC at the hold points in procedure 27563-C	PC	3/28/90	PC	3/29/90	PC	F
	H	Notify QC prior to starting the diesel			PC	3/31/90	PC	I
	H	Notify QC prior to performing leak test			PC	3/31/90	PC	I
	H	Notify QC prior to performing the following steps						
		Step #2 Normal Start			PC	3/29/90	PC	I
		Step #3 Load Start						
		Step #4 Normal Start						
		Step #5 SI Start			PC	3/28/90	PC	I
		Note: Steps 2, 3, 4, 5 are witness points for QC only. No inspection required.						


IR NUMBERS: (initial and date entries)

IR 34189 PC 3/29/90
IR 34128 PC 3/31/90

IR 34174 9.20.9-31-90

Quality Control Inspection Report

VOGTLE GENERATING PLANT—UNITS 1 & 2

Georgia Power 

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WO/ODR/DR No. 1901576	Building A TRAIN DIESEL	Procedure/Spec. No./Rev. NA
Room No./Level No. 103 / 1	Sys./Start-Up Designator 2403	Tag No. 1-2403-P5-DG2
Drawing No./Rev. NA	Vendor Manual Log No. NA	Other NA

- Inspector will use separate form for each completed inspection function(s) and insert original with work package, use continuation sheets when needed.
- Use simple narrative type report, procedure. Reference all applicable drawing numbers, specifications, special instructions, etc., connected with your inspection. Use sketches, when applicable, showing dimensions checked, alignment, physical location of defects found, etc. N/A all blocks not used.
- Upon completion of the inspection activity, enter results below and sign and date.

Remarks: **QUALITY VERIFIED: PERFORMANCE OF LEAK TEST ON THE FOLLOWING LINES PER STEP 1 OF P43 P WORK ORDER.**

LINE	RESULTS	SNOOP TEST
E-10A TRIP LOW PRESSURE LUBE OIL	NO BUBBLES	NO LEAKS
E-10B	NO BUBBLES	NO LEAKS
E-10-3	NO BUBBLES	NO LEAKS
E-63 TRIP HIGH PRESSURE CRANK CASE	NO BUBBLES	NO LEAKS
E-92 TRIP LOW PRESSURE TURBIN OIL	LEAK @ 1 BUBBLE PER SEC.	VISIBLE BUBBLES
E-14 TRIP LOW PRESSURE TURTLE OIL	NO BUBBLES	VISIBLE BUBBLES
E-25H TRIP HIGH VIBRATION	LEAK @ 3 BUBBLES PER SEC.	VISIBLE BUBBLES
E-19 TRIP HIGH TEMPERATURE ENGINE OIL	LEAK @ 1 BUBBLE PER SEC.	VISIBLE BUBBLES
E-18 TRIP HIGH TEMPERATURE LUBE OIL	NO BUBBLES	VISIBLE BUBBLES

② LEAKS ABOVE HAVE SEE CONST SAT. NOT BEEN CORRECTED! PER MW0

Inspection Results

SAT. UNSAT—ODR/DR NO.(S) **D.C. * 1-90-0154** ⊕

Inspector *[Signature]* Date **INT II-196**
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WO/ORD No./Other
1000576

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T.P. 34174

Remarks

Visually Verified Performance of Multiple Starts per Following
 SE'S PER Pg 4 of MWDO
 STEP #2 NORMAL START, TRIP BY HIGH TEMPERATURE OIL BY LOOSENING FITTING
 AT 1754 MW4, ALSO RETIGHTENING OF FITTING.
 STEP #3 LOSS START BY PLYING JUMPER IN GEN CONTROL PANEL
 ACROSS T.P. 211 AND 213. THEN TRIP BY LOOSENING FITTING ON
 VIBRATION SWITCH. VERIFIED JUMPER REMOVED AND FITTINGS TIGHTENED.
 STEP #4 NORMAL START, TRIP BY LOOSENING FITTING ON HIGH OIL PRESSURE
 PRESSURE SWITCH, VERIFIED RETIGHTENING OF FITTING.
 STEP #5 ST START BY PLYING JUMPER IN GEN CONTROL PANEL ACROSS
 T.P. 204 AND 205. THEN TRIP BY LOOSENING OF FITTINGS ON 205 THE
 3 LOW OIL PRESSURE SWITCHES, VERIFIED REMOVAL OF JUMPER
 AND FITTINGS TIGHTENED. ALL CONNECTIONS OF FITTINGS WERE
 SAND TESTED AND ACCEPTABLE.
 KE-12A, EN-3, FICC ARE NOT FINAL TESTED TEST MW11 AND
 MW12 WERE NOT FUNCTIONING PROPERLY WILL BE
 REPAIRED. THIS WAS NOTICED ON START OF DRESS WHEN
 HIGH TEMPERATURE SWEET WATER MALFUNCTION LIGHT CAME ON
 SO TO DETERMINE WHICH SWITCH WAS INITIATING ALARM
 3 GAUGES, ONE FOR EACH TEMP SWITCH WAS CONNECTED
 IN LINE TO WAF-4 PRESSURE. PRESSURE GAUGE FOR 1754 MW
 DID NOT INCREASE AS RAPIDLY AS THE OTHER TWO GAUGES
 SO COOPER RCP. CLOSED TUBING LINE TO 1754 MW
 AND PRESSURE INCREASED RAPIDLY. ^{AT GAUGE} HE THEN RELEASED
 TUBING AND PRESSURE FELL BACK TOWARD THIS WAS
 REPEATED A COUPLE OF TIMES. THEN PRESSURE STARTED
 TO INCREASE UNTIL IT REACHED OPERATIVE PRESSURE

70517 MC3181

Inspector
Tony Williams

Date
3-31-80


WHITE—Work Package CANARY—O.C. Supv. PINK—Inspector

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Quality Control Inspection Report

VOGTLE GENERATING PLANT—UNITS 1 & 2

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Georgia Power 

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WOORVDR No <u>19001576</u>	Building <u>Diesel Generator</u>	Procedure/Spec. No./Rev. <u>275634R/2</u>
Room No./Level No. <u>Room 103 Level 4</u>	Bye./Start-Up Designator <u>2403</u>	Tag No. <u>1-2403-P5-DG2</u>
Drawing No./Rev. <u>N/A</u>	Vendor Manual Log No. <u>N/A</u>	Other <u>N/A</u>

1. Inspector will use separate form for each completed inspection function(s) and insert original with work package, use continuation sheets when needed.
2. Use simple narrative type report procedure. Reference all applicable drawing numbers, specifications, special instructions, etc., connected with your inspection. Use sketches, when applicable, showing dimensions checked, alignment, physical location of defects found, etc. N/A all blocks not used.
3. Upon completion of the inspection activity, enter results below and sign and date.

Remarks

Visually verified checking for leaks in
Engine Control Panel 12403 P5 DG2. Lines
E-16A, E-16B and E-16C were checked. During Bubble
Test results were as follows.
E-16A 1 Bubble/sec
E-16B 1 Bubble/3sec
E-16C no leakage detected.
Visually verified soap test for leaks on
Lines in Engine Control Panel 12403 P5 DG2. Results were
E-16A - no leakage visible
E-16B - some leakage detected this problem was solved by tightening
E-16C - no leakage visible

Sketch

Inspection Results

SAT UNSAT—OODVDR NO.(#)

Inspector
Ronald L. Colman


Date
5/31/90

WHITE—Work Package CANARY—QC Supv PINK—Inspector

Int. II-196
202159.1.4

Quality Control Inspection Report

VOGTLE GENERATING PLANT—UNITS 1 & 2

Georgia Power 
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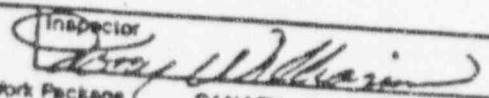
MWO/OOR/DR No. 19001576	Building "A" TRAIN DIESEL	Procedure/Spec. No./Rev. 27563-C R2
Room No./Level No. 103/1	Sys./Start-Up Designator 2403	Tag No. 12413-PS-DK2
Drawing No./Rev. NA	Vendor Manual Log No. AX441-509 I-170 R11	Other NA

- Inspector will use separate form for each completed inspection function(s) and insert original with work package, use continuation sheets when needed.
- Use simple narrative type report procedure. Reference all applicable drawing numbers, specifications, special instructions, etc., connected with your inspection. Use sketches, when applicable, showing dimensions checked, alignment, physical location of defects found, etc. N/A all blocks not used.
- Upon completion of the inspection activity, enter results below and sign and date.

Remarks
 Usually Verified: RECONNECTION OF TUBING BY CAPING LINE PER STEP 4.2.59 AND DEENERGIZATION OF ALARM PER STEP 4.2.59.1. UNIT AVAILABLE EMERGENCY LIGHT ENERGIZED PER STEP 4.2.64.1 AND DROPPED P.C. START POWER FAILURE ALARM DEENERGIZED PER STEP 4.2.64.2. RELAY R-233 DEENERGIZED PER STEP 4.2.66.1 INCORRECT ON DATA SHEET SHOWS R-230. FREQUENCY CONVERTER OFF AND TUBING E16A & B RECAPED PER STEP 4.2.72 DATA SHEET DOES NOT SHOW E16A & B. 4.2.74 TUBING LINES E16B AND E16C RECAPED. 4.2.76 TUBING LINES E16A AND E16C RECAPED. 4.2.77.1 GROUP I PRESSURE < 2.5 PSID. THERE IS NO I.D. ON GAUGE SUGGESTING IT IS GROUP I GAUGE ENG. PAUL COCHERY VERIFIED THIS GAUGE AS PROPER GAUGE PER ULVOR MANUAL AX441-509 R11 PRESSURE GAUGE IS CORRECT.

N/A

Inspection Results
 SAT UNSAT—OOR/DR NO. (X)

Inspector: 
 Date: 5-29-90

WHITE—Work Package CANARY—O.C. Supv. PINK—Inspector

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WVWORD No./Other

19001576

I.R. 34172

Remarks

4.2.77.2 BY PASS TEST FAILURE LIGHT INDICATORIZED

4.2.77.3.1 BY PASS TEST FAILURE LIGHT ENERGIZED.

4.2.89.1 TURBINE RECONNECTED AT FITTING E10A

4.2.89.2 E10B

4.2.89.3 E10C

4.2.90 E92

4.2.91 E14

4.2.94 REPAIRING OF LIPTED WIRE PER LIPTED LEAD DATA

4.2.95 ↓ ↓ ↓

VERIFIED ALSO LINKS CLOSED PER LIPTED LEAD DATA

WST. AND TURBINES REPAIRED AND LIPTED WIRES REPAIRED.

CABLE 1ACBAG03A SR FOR STEP 4.2.94 TB. E10A

CABLE 1ACBAG03A ST FOR STEP 4.2.95 TB. E10B

Inspector *[Signature]*

Date 3-29-70

WHITE—Work Package

CANARY—QC Supv

PI/K—Inspector

INT II-196
 08/17/064

Quality Control Inspection Report

VOGTLE GENERATING PLANT—UNITS 1 & 2

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Georgia Power

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MWO/ODR/DR No. 19001576	Building Diesel	Procedure/Spec No./Rev. 27563-C R/2
Room No./Level No. TRAIN A	Bye/Start-Up Designator 2403	Tag No. 12403 P5 DG 2
Drawing No./Rev. N/A	Vendor Manual Log No. N/A	Other N/A

- Inspector will use separate form for each completed inspection function(s) and insert original with work package, use continuation sheets when needed.
- Use simple narrative type report procedure. Reference all applicable drawing numbers, specifications, special instructions, etc., connected with your inspection. Use sketches, when applicable, showing dimensions checked, alignment, physical location of defects found, etc. N/A all blocks not used.
- Upon completion of the inspection activity, enter results below and sign and date.

Remarks

① Started witnessing Engine basic Testing at approximately 1500 CST using 27563-C R/2

M&TE used

FUNCTION GENERATOR	VP 1283	CDD 7-27-90
FLUTE	VP 1028	CDD 4-9-90
FLUTE	VP 1-1044	CDD 4-8-90

② Visually witnessed the following steps performed in procedure 27563-C R/2

step 4.1.13 60 PSI at Control air pressure gauge

4.1.14 12.5 VDC across circuit breaker CB-1+2

Sketch

4.2.24.1	125 volts present
4.2.24.3	CONTACT closed
4.2.24.4	Relays energized
4.2.24.5	Contact closed
4.2.24.6	S-I signal light Energized
4.2.24.7	Shutdown light de-Energized
4.2.24.8	NO voltage on solenoid

continued on page 2

Inspection Results

SAT UNSAT—ODR/DR NO. ()

Inspector: J. L. Harvey Date: 3-29-90

WHITE—Work Package CANARY—O.C. Supv. PINK—Inspector

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MWO/ORD No./Other

19001576 IR 34189

Remarks

- 4.2.26.2 Shuttered cylinder not extended
- 4.2.27 Tubing E-18 Reconnected
- 4.2.27.1 Group 1 Pressure gauge - 60 PSI
- 4.2.27.2 Hi temp alarm de-energized
- 4.2.28.1 Stopping Light Energized
- 4.2.28.2 Low pressure alarm energized
- 4.2.28.5 Engine shutdown cylinder extended
- 4.2.30 E-92 plug installed
- 4.2.30.1.1 Relay 1143 Energized
- 4.2.30.1.4 Ready to load light energized
- 4.2.30.2.4 Ready to load light de-energized
- 4.2.31.1 No voltage present
- 4.2.31.2 Relay R-513 Energized
- 4.2.32.1 Relay R-23B Energized
- 4.2.32.1.2 Relay R-35 Energized
- 4.2.32.1.2.1 Relay R-35 Energized
- 4.2.32.1.2.2 Emergency trip de-energized
- 4.2.35.2 Overspeed trip de-energized
- 4.2.36.1 Relay R-23B De-energized
- 4.2.36.5 Emergency stop light de-energized
- 4.2.36.6 Stopping light de-energized
- 4.2.36.7 Relay R-35 de-energized
- 4.2.37.1 125 VDC present
- 4.2.37.2 DG Auto Start signal Energized
- 4.2.37.2.1 Relay R-313 Energized
- 4.2.41.1 Emergency trip alarm is Energized
- 4.2.41.3 Relay R-35 Energized
- 4.2.42.3 Relay R-35 De-energized
- 4.2.48.1 125 VDC present
- 4.2.48.2 Failure to start ALARM Energized
- 4.2.49.1 NO VOLTAGE present
- 4.2.49.5 Starting Light Energized
- 4.2.49.6 Relay R-1 Energized
- 4.2.49.7 Running light Energized

Inspector

J.C. Harvey

See continuation pg. 3

DATE 3-29-90

WHITE—Work Package

CANARY—QC Supv.

PINK—Inspector

MWORD No/Other

19001576

IR 34189

Remarks

~~step 4.2.44 pt 3/29/90~~

step 4.2.50.1

Shutdown cylinder extended

4.2.51.1

Hi bearing temp alarm de-energized

4.2.53.1

125V DC Present

4.2.55

Tubing E-68 Reconnected

4.2.55.1

Hi Pressure Alarm DC-energized

4.2.55.4

Shutdown Cylinder not extended

4.2.57

Tubing E-23-1d Reconnected

4.2.57.1

Vibration Alarm De-energized

All km-43-29-91

All steps were performed as required by
procedure 77563-C

N
A

Inspector

J.C. Harvey

Date

3-29-90

WHITE—Work Package

CANARY—OC SUDY

PINK—Inspector

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EQ EVALUATION CHECKLIST
FOR USE ON PROJECT CLASSES Q111, Q212,
Q313, Q013, Q015, Q11E, Q11J, Q12E, 61J

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MWO NO. 19001576

PART A ORIGINAL PART

SECTION I

- 1. DESCRIPTION DIESEL GEN
- 2. TAG NO. 1-2403-G4-001
- 3. PROJECT CLASS 015
- 4. SPECIFICATION (EQDP) NO. X9AK01
- 5. MANUFACTURER DELAVAL
- 6. MODEL NO. N/A
- 7. PART NO. 1

PART B REPLACEMENT PART

- 1. DESCRIPTION _____
- 2. MFR NO. _____
- 3. STOCK NO. _____
- 4. SPECIFICATION (EQDP) NO. _____
- 5. MANUFACTURER _____
- 6. MODEL NO. _____
- 7. PART NO. _____
- 8. PO NO. _____

COMMENTS NO PARTS USED

SECTION II WORK PLANNING

- 1. ARE PROCEDURES, VENDOR MANUALS, DRAWINGS OR INSTRUCTIONS AVAILABLE TO DISASSEMBLE/REWORK COMPONENT?
- 2. ARE SPECIFICATION NUMBERS FOR ORIGINAL AND REPLACEMENT ITEMS THE SAME?
- 3. ARE MANUFACTURER MODEL/PART NUMBERS OF THE ORIGINAL AND REPLACEMENT PARTS THE SAME?
- 4. IS BULK MATERIAL LISTED ON ATTACHMENT ACCEPTABLE? LIST ITEM NO. FROM ATTACHMENT IF "NO" IS CHECKED.

YES NO
2/17 13/2/64
(Init. Date)

YES NO

YES NO

YES NO

1
(Init. Date)

N/A
(Item No.)

NOTE

If items 2, 3, or 4 are checked No, the Checklist must be reviewed by the EQ Group.

- PART(S) ARE ACCEPTABLE FOR USE
- SEND TO EQ GROUP

7/2/64 14-290
MWO DATE

SECTION III EQ GROUP EVALUATION

- PART IS ACCEPTABLE FOR USE
 - PART IS UNACCEPTABLE FOR USE
- JUSTIFICATION FOR ACCEPTANCE:

EQ ENGINEER _____ DATE _____

FIGURE 5

VEGP FIRE PROTECTION CHECKLIST

1. MWO NO. 19001576 2. MPL/TAG NO. 1240364001

3. LOCATION D.G. BLDG. "A" TRAIN

4. WILL THE WORK INSTALL, IMPAIR, MODIFY, ISOLATE, DEFEAT, OR REMOVE ANY OF THE FOLLOWING? IF THE ANSWER IS "YES" CHECK THE BOX, AND INDICATE APPROPRIATE DETAILS.

- SPRINKLER SYSTEM _____
- INTERIOR HOSE STATION _____
- HALON SYSTEM _____
- DETECTION SYSTEM _____
- EMERGENCY LIGHTING SYSTEM _____
- PERMANENT COMBUSTIBLES (CABLE, WOOD, PLASTIC, ETC.) _____
- STRUCTURAL STEEL, OR RACEWAY FIREPROOFING _____
- FIRE SUPPRESSION SUPPLY SYSTEM (PUMPS, TANKS, ETC.) _____
- CONDUIT SEALS OR EQUIPMENT ENCLOSURE (CABINET HOUSING) _____
- FIRE EXTINGUISHER _____
- COMMUNICATIONS SYSTEM _____
- RCP OIL COLLECTION SYSTEM _____
- SEISMIC STANDPIPE SYSTEM _____

5. WILL THE WORK DEFEAT, MODIFY OR IMPAIR ANY OF THE FOLLOWING FIRE SEPARATION FEATURES? IF THE ANSWER IS "YES" CHECK THE BOX, AND INDICATE APPROPRIATE DETAILS.

- A. FIRE AREA BOUNDARY (WALL, ETC.) _____
- B. PASSIVE AREA BOUNDARY PENETRATION SEAL ASSEMBLY.
 - _____ PENETRATION SEAL
 - _____ WALL BLOCKOUT
 - _____ FLOOR PLUG OR HATCH
 - _____ CABLE TRAY OR CONDUIT WRAP
 - _____ RADIANT ENERGY SHIELD
- C. ACTIVE FIRE AREA BOUNDARY PENETRATION SEAL.
 - _____ FIRE DOOR
 - _____ FIRE DAMPER

6. IF ALL THE ANSWERS IN BLOCKS 4 and 5 ARE "NO", STOP THE EVALUATION HERE, AND ENTER "NO" IN BLOCK 11 OF THE MWO FORM. IF ANY QUESTIONS WERE ANSWERED "YES", ENTER "YES" IN BLOCK 11 OF THE MWO FORM.

EVALUATOR JH Pde DATE 3/28/90

POST WORK REVIEW (COMPLETE "A, B, OR C" BELOW)

(A) THE CONDITION IMPACTING THE FIRE PROTECTION COMPONENTS LISTED ABOVE HAS BEEN REMOVED. FPE _____ DATE _____

(B) THE FIRE PROTECTION COMPONENT IS STILL IMPAIRED. FPE N/A DATE _____

(C) RESTORATION OF THE IMPAIRMENT HAS BEEN TRANSFERRED (Ref: _____) AND THE FIRE PROTECTION LCO LOG HAS BEEN CHANGED TO REFERENCE THE NEW MWO FOR THIS IMPAIRMENT. FPE _____ DATE _____

FIGURE 1

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

Sheet 1 of 1
1 of 12

Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC HOLD POINT QC VERIF. BY/DATE
OPEN LINE ES-4	1-2403-P5-062	TAT 3/29/90	DIP 3/29/90		DIP 3/29/90	TAT 3-29-90	TAT 3-29-90
E4-2							
L5-105							
L4-102							
E19-53							
E22-56							
QC E4-E7-51				N/A			
E21-55							
E23-57							
E18-52		TAT 3/29/90	DIP 3/29/90		DIP 3/29/90	TAT 3-29-90	TAT 3-29-90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If Holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION			QC HOLD POINT
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	QC VERIF. BY/DATE
ORIG LWS E24-59	1-2403-P5-DG2	RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	T.W 3-29-90	N/A
E5-77								
E6-78								
E57-46								
E58-47								
E59-48								
E60-49								
F1-73								
F2-74								
✓ F3-75		RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-27-90	T.W 3-29-90	

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC HOLD POINT VERIF. BY/DATE
OPEN L10K F9-76	1-2403-PS-DG2	RAJ 3/29/90	DJP 3/29/90		DR 3/29/90	RAJ 329-90	T.W. 3/29/90
L30-170							
L31-171							
L31-171 L32-172							
L33-173							
L23-153				N/A			
L20-141							
L21-144							
L24-155							
L51-159		RAJ 3/29/90	DJP 3/29/90		DR 3/29/90	RAJ 329-90	T.W. 3/29/90

T.W. 3/29/90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		QC HOLD POINT
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE
OPEN LOK L52-160	1-2403-95-DG2	RAJ 3/27/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	DW 3-29-90
L53-164							
L54-165							
L55-166							
L56-167				NA			
L57-168							
L58-169							
L59-179							
L60-180							
L35-175		RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	DW 3-29-90

J.P. B. WIRE

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

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NOTES

Non-Safety Related

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s), scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, MA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC HOLD POINT QC VERIF. BY/DATE
OPEN LINES L36-176	1-2403-PS-DG2	RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	W 3/29/90
L9-137							
L10-138							
L11-139							
L12-140							
L19-336							
L15-337							
L49-5981							
L50-5982							
L25-79-180							
		RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	W 3/29/90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION			QC HOLD POINT
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	QC VERIF. BY/DATE
OPEN L26	L26-90-180	1-2403-PS-DG2	TAJ 3/29/90	DR 3/29/90		DR 3/29/90	TAJ 3/29/90	TCU 3/29/90
C8-244						DR 3/29/90		
C9-245								
C5-246								
C11-247								
C7-239								
C8-240								
G3-253								
G4-254								
G5-255			TAJ 3/29/90	DR 3/29/90		DR 3/29/90	TAJ 3/29/90	TCU 3/29/90

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POWER AND SIGNAL REMOVAL

Safety Related/QC Holdpoints

DATA SHEET

Sheet 1 of 1
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NOTES

Non-Safety Related

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LIFTS OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC HOLD POINT QC VERIF. BY/DATE
OPEN LUCK G6-256	1-2403-P5-DG2	RAJ 3/29/90	DP 3/29/90		DP 3/29/90	RAJ 3-29-90	TC 3-29-90
G7-257							
G8-258							
G9-259							
G10-260							
G11-261 TAG				N/A			
G12-262 TAG							
G13-263							
G14-264							
G15-265		RAJ 3/29/90	DP 3/29/90		DP 3/29/90	RAJ 3-29-90	TC 3-29-90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/schema number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE
OPEN WIRE G16-266	1-2405-PS-D42	RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	JUL 3-29-90
G17-267							
G18-268							
G19-269							
G20-270							
G21-271							
G22-272							
G23-273							
G24-274							
✓ H1-275		RAJ 3/29/90	DJP 3/29/90		DJP 3/29/90	RAJ 3-29-90	JUL 3-29-90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00365-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION		QC HOLDPOINT QC VERIF. BY/DATE
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	
OPW LWK H2-276	1-2403-75-0G2	RAJ 3/27/90	DJP 3/29/90		DR 3/29/90	RAJ 3-29-90	DR 3/29/90
H19-298							
H20-299							
H3-277							
H4-278							
H7-281				N/A			
H8-282							
H9-283							
H10-284							
H11-285		RAJ 3/29/90	DR 3/29/90		DR 3/29/90	RAJ 3-29-90	DR 3/29/90

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POWER AND SIGNAL REMOVAL/REPLACEMENT DATA SHEET

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Safety Related/QC Holdpoints

Non-Safety Related

NOTES

- a. To install jumpers and/or lift wires, other than those directly associated with the equipment tag(s)/scheme number(s) listed on the Work Order, notify the Shift Supervisor and comply with his instructions.
- b. Ensure that each lead (wire) is marked so it can be uniquely identified with its termination point.
- c. Independent verification is only required on safety related equipment. Place N/A in independent verification block for non-safety related equipment.
- d. If the worker leaves the immediate proximity of the work or the work is interrupted, complete and install a "Jumper and Lifted Wire" tag per 00306-C, "Temporary Jumper And Lifted Wire Control". Instead of Control Number use the Procedure number on the tag.
- e. If holdpoints do not apply, NA QC Verification block.
- f. If applicable, tags shall remain intact and will only be removed by the independent verifier.

IDENTIFY LEADS LIFTED, JUMPERS INSTALLED, LINES OPEN, ETC.	LOCATION PANEL OR JUNCTION BOX	REMOVAL			RECONNECTION			QC HOLD POINT
		PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	PERFORMED BY/DATE	INDEPENDENT VERIFICATION BY/DATE	QC VERIF. BY/DATE	
OPEN WIRE H12-286	1-2403-PS-DG2	ZAT 3/29/90	DP 3/29/90		DP 3/29/90	ZAT 3-29-90	ZAT 3-29-90	
H13-287								
H14-288								
H15-289								
H16-290								
H17-296								
H18-297								
A35-612								
A36-613								
E7-79		ZAT 3/29/90	DR 3/29/90		DR 3/29/90	ZAT 3-29-90	ZAT 3-29-90	

COMPLETION SHEET

PROCEDURE 27563-C	REVISION 2	H20 190001576	
TAG NO. 1-2403-G4-001	DESCRIPTION DIESEL GENERATOR	SHEET 1 OF 30	
SERIAL NO. 76021	MANUFACTURER ENTERPRISE	MODEL DSRV-16-4	
TEST EQUIPMENT USED See Block 27	NOTE # See Block 27	<input checked="" type="checkbox"/> Safety Related/QC Hold Point <input type="checkbox"/> Non-Safety Related	

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.1.1	Prerequisites met			
4.1.2	Shift Supervisor notified	RA 12-29-90	NO	RA 12/28/90
4.1.5.1	Tubing E-10A disconnected	RA 13-29-90		
4.1.5.2	Tubing E-10B disconnected			
4.1.5.3	Tubing E-10C disconnected			
4.1.6.1	Tubing E-92 disconnected			
4.1.7.1	Tubing E-14 disconnected			
4.1.8.1	A-Bank Starting Air Valve. Terminals E5 (4) and E4 (2).	RA 13-29-90		
4.1.8.2	B-Bank Starting Air Valve. Terminals L5 (105) and L4 (102).	RA 13-29-90		

PROCEDURE STEP

DESCRIPTION

MAINT. INIT/DATE

HOLD POINT (Yes/No)

QC INIT/DATE

<u>PROCEDURE STEP</u>	<u>DESCRIPTION</u>	<u>MAINT. INIT/DATE</u>	<u>HOLD POINT (Yes/No)</u>	<u>QC INIT/DATE</u>
4.1.8.3	Field Flash, Exciter Reg Enable. Terminals E19 (53), E22 (56), E17 (51), and E21 (55).	ZAT 13/29/60	No	10/13/28/70
4.1.8.4	Preset V.R. and Gov.: Terminals E23 (57), E18 (52), and E24 (59).	/	/	/
4.1.8.5	Ready to Load, DG Brkr.: Terminals F5 (77) and F6 (78).	/	/	/
4.1.8.6	Ready to Load, HVAC Sys.: Terminals E57 (46) and E58 (47).	/	/	/
4.1.8.7	Ready to Load, Spare. Terminals E59 (48) and E60 (49).	/	/	/
4.1.8.8	Start, Spare. Terminals F1 (73) and F2 (74).	/	/	/
4.1.8.9	Stop, Spare. Terminals F3 (75) and F4 (76).	/	/	/
4.1.8.10	Pre-position Gov and V.R. Terminals L30 (170) and L31 (171).	/	/	/
4.1.8.11	186C Trip Delay Terminals L32 (172) and L33 (173).	/	/	/
4.1.8.12	Field Flash, Exciter Reg Enable. Terminals L23 (153), L20 (141), L21 (144), and L24 (155).	/	/	/
4.1.8.13	Trip 52G. Terminals L51 (159) and L52 (160).	/	/	/
4.1.8.14	Emergency Stop. Terminals L53 (164) and L54 (165).	ZAT 13/29/60	↓	↓

PROCEDURE STEP

DESCRIPTION

MAINT. INIT/DATE

HOLD POINT (Yes/No)

QC INIT/DATE

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.1.8.15	Running, Spare. Terminals L55 (166) and L56 (167).	ZAJ 13/27/90	No	KLT 13/28/90
4.1.8.16	Running, Spare. Terminals L57 (168) and L58 (169).	/	/	/
4.1.8.17	Overspeed, Spare. Terminals L59 (179) and L60 (180).	/	/	/
4.1.8.18	Running W/Delay. Terminals L35 (175) and L36 (176).	/	/	/
4.1.8.19	Ready to Load - HVAC System. Terminals L9 (137) and L10 (138).	/	/	/
4.1.8.20	Ready to Load - Spare. Terminals L11 (139) and L12 (140).	/	/	/
4.1.8.21	Emergency Stop. Terminals L14 (336) and L15 (337).	/	/	/
4.1.8.22	ERP Computer. Terminals L49 (S4B1) and L50 (S4B2).	/	/	/
4.1.8.23	Emergency Stop Annunciation. Terminals L25 (79-180) and L26 (90-180).	/	/	/
4.1.8.24	CC Fan #1. Terminals C3 (244) and C9 (245).	/	/	/
4.1.8.25	CC Fan #2. Terminals C5 (246) and C11 (247).	/	/	/
4.1.8.26	Generator Space Heater Control. Terminals C7 (239) and C8 (240).	/	/	/
4.1.8.27	Running Contacts. Terminals G3 (253), G4 (254), G5 (255), G6 (256), G7 (257), G8 (258), G9 (259), G10 (260), G11 (161), and G12 (162).	ZAJ 13/27/90	/	/

PROCEDURE STEP

DESCRIPTION

MAINT. INIT/DATE

HOLD POINT (Yes/No)

QC INIT/DATE

<u>PROCEDURE STEP</u>	<u>DESCRIPTION</u>	<u>MAINT. INIT/DATE</u>	<u>HOLD POINT (Yes/No)</u>	<u>QC INIT/DATE</u>
4.1.8.28	Running W/Delay Contacts. Terminals G13 (263), G14 (264), G15 (265), G16 (266), G17 (267), G18 (268), G19 (269), G20 (270), G21 (271), G22 (272), G23 (273) and G24 (274).			
4.1.8.29	Loss of DC Annunciation. Terminals H1 (275) and H2 (276).	RAJ 13/29/90	No	KU-13/29/90
4.1.8.30	Mechanical Trouble Alarm. Terminals H19 (298) and H20 (299).	/	/	/
4.1.8.31	Lockout Alarm. Terminals H3 (277) and H4 (278).	/	/	/
4.1.8.32	Failed to Start. Terminals H7 (281) and H8 (282).	/	/	/
4.1.8.33	Unit Available Local Control. Terminals H9 (283) and H10 (284).	/	/	/
4.1.8.34	Unit Available. Terminals H11 (285), H12 (286), H13 (287), H14 (288), H15 (289), and H16 (290).	/	/	/
4.1.8.35	Alarm. Terminals H17 (296) and H18 (297).	/	/	/
4.1.8.36	Loss of DC Power. Terminals A35 (612) and A36 (613).	/	/	/
4.1.8.37	DC Brkr Inop. Terminals F7 (79) and F8 (80).	RAJ 13/29/90	/	/
4.1.9	Toggle switches to hourmeter open.	RAJ 13/29/90	/	/

PROCEDURE STEP

DESCRIPTION

MAINT. INIT/DATE

HOLD POINT (Yes/No)

QC INIT/DATE

4.1.10.1 At on-engine "EJBA" Junction Box, disconnect engine wire number 4 and tape wire end.

TAJ 13/29/90

No

JCN 13/28/90

4.1.11.1 At on-engine "EJBB" Junction Box, disconnect engine wire number 105 and tape wire end.

TAJ 3/29/90

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↓

4.1.12 Verify that all circuit breakers are closed.

TAJ 3/29/90

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↓

4.1.13 Verify 60 psi at control air pressure gauge.

TAJ 3/29/90

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↓

4.1.14 Verify 125 vdc across circuit breakers CB-1 and CB-2, CB-3 and CB-4.

TAJ 3/29/90

OC HOLD POINT

JCN 13/28/90

4.2.1 Jumper terminals L45 (101) and L48 (129), Control Room permissive for maintenance mode.

TAJ 3/29/90

OC HOLD POINT

JCN 13/28/90

4.2.2.1 Disconnect jumper across terminals H4 (278) and H12 (286) and verify:

N/A W 3/28/90

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↓

↓

4.2.2.2 Open contact across terminals H3 (277) and H4 (278).

↓

↓

↓

4.2.2.3 Contact OPEN

↓

↓

↓

4.2.2.4 Contact OPEN

↓

↓

↓

4.2.2.5 Contact CLOSED

↓

↓

↓

4.2.2.6 Contact CLOSED

↓

↓

↓

4.2.3.1 Shutdown Cylinder EXTENDED

↓

↓

↓

4.2.3.2 Lockout alarm ENERGIZED

↓

↓

↓

N/A JCN 3/28/90

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PROCEDURE
STEP

DESCRIPTION

MAINT.
INIT/DATE

HOLD
POINT
(Yes/No)

QC
INIT/DATE

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.3.3	Lights Energized	/	/	/
4.2.3.4	Gauge indicates 0 PSI	N/A/PCSE 13/24/90	/	/
4.2.3.5	Lockout Pin REMOVED	/	/	/
4.2.3.6	STOPPING light ENERGIZED	/	/	/
4.2.3.7	Contact CLOSED	/	/	/
4.2.3.8	Contact CLOSED	/	/	/
4.2.3.9	Contact CLOSED	/	/	/
4.2.3.10	Contact CLOSED	/	/	/
4.2.3.11	Contact CLOSED	/	/	/
4.2.3.12	Contact OPEN	/	/	/
4.2.4	Contact OPEN	/	/	/
4.2.5.1	Jumper Removed	/	✓ A 10/3/78 (9)	/
4.2.6.1	125VDC present	/	/	/
4.2.6.2	No voltage present	/	/	/
4.2.7	No voltage present	/	/	/
4.2.7.1	Wire disconnected	/	/	/
4.2.7.2	Relay R-35 De-energized	/	/	/
4.2.7.3	Contact OPEN	/	/	/
4.2.8.1	Lockout alarm de-energized	/	/	/
	Barring device engaged alarm ENERGIZED	/	/	/

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PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.8.2	Contact CLOSED	N/A	/	/
4.2.8.3	Relay R-35 ENERGIZED	12/2/90	/	/
4.2.9.1.1	125VDC Present	/	/	/
4.2.9.2.1	No voltage present	/	/	/
4.2.9.2.2	No voltage present	/	/	/
4.2.10.1	Barring device engaged alarm ENERGIZED	/	/	/
4.2.10.2	Contact OPEN	/	/	/
4.2.10.3	Relay R-35 DE-ENERGIZED	/	/	/
4.2.11	Wire Reconnected	/	N/A	10/13/90
4.2.11.1	Relay R-35 DE-ENERGIZED	/	/	/
4.2.11.2	Lockout alarm ENERGIZED	/	/	/
4.2.12.1	Shutdown cylinder RETRACTED	/	/	/
4.2.12.2	Pressure Gauge reads 60PSI	/	/	/
4.2.12.3	Lockout alarm DE-ENERGIZED	/	/	/
4.2.12.4	Emergency status light ENERGIZED	/	/	/
4.2.12.5	Lockout pin in LOCKED position	/	/	/
4.2.12.6	STOPPING light DE-ENERGIZED	/	/	/

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PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.12.7	BARRING device RETRACTED	/	/	/
4.2.12.8	Locking pin INSTALLED	N/A 1/3/28/90	/	/
4.2.13.1	No voltage PRESENT	/	/	/
4.2.14.1	No voltage PRESENT	/	/	/
4.2.14.2	"A" power light DE-ENERGIZED	/	/	/
4.2.14.3	Panel "A" failure alarm ENERGIZED	/	/	/
4.2.14.4	Contact CLOSED	/	/	/
4.2.15	Timer REMOVED	/	N/A 1/3/28/90	/
4.2.16.1	125VDC PRESENT	/	/	/
4.2.16.2	Alarm ENERGIZED	/	/	/
4.2.16.3	Relay DE-ENERGIZED	/	/	/
4.2.16.4	Contact CLOSED	/	/	/
4.2.16.5	Contact CLOSED	/	/	/
4.2.16.6	Relay R-35 ENERGIZED	/	/	/
4.2.16.7	Horn ENERGIZED	/	/	/
4.2.17.1	Horn DE-ENERGIZED	/	/	/
4.2.17.2	Contact OPEN	/	/	/
4.2.17.3	Relay R-35 DE-ENERGIZED	/	/	/

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PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.17.4	Failed to start alarm DE-ENERGIZED	N/A 10/13/1970	/	/
4.2.18.1	Contact CLOSED	/	/	/
4.2.18.2	Contact CLOSED	/	/	/
4.2.18.3	No voltage PRESENT	/	/	/
4.2.18.4	Contact CLOSED	/	/	/
4.2.18.5	Contact CLOSED	/	/	/
4.2.18.6	Running light ENERGIZED	/	/	/
4.2.18.7	Failed to start alarm DE-ENERGIZED	/	/	/
4.2.18.8	Contact CLOSED	/	/	/
4.2.18.9	Contact OPEN	/	/	/
4.2.18.10	Contact CLOSED	/	/	/
4.2.18.11	Relay R 1 ENERGIZED	/	N/A 10/13/1970	/
4.2.18.12	Contact CLOSED	/	/	/
4.2.18.13	Contact CLOSED	/	/	/
4.2.18.14	Contact CLOSED	/	/	/
4.2.18.15	Contact CLOSED	/	/	/
4.2.18.16	Contact OPEN	/	/	/
4.2.18.17	Contact OPEN	/	/	/
4.2.18.18	Contact OPEN	/	/	/
4.2.18.19	Contact CLOSED	/	/	/
4.2.18.20	Contact CLOSED	/	/	/

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PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.18.21	Contact CLOSED	NA CP 1/2/90	/	/
4.2.18.22	Contact OPEN	/	/	/
4.2.18.23	Contact OPEN	/	/	/
4.2.18.24	Contact OPEN	/	/	/
4.2.19	Maintenance Button Pushed	/	/	/
4.2.19.1	Maintenance mode alarm DE-ENERGIZED	/	/	/
4.2.20.1	Contact OPEN	/	/	/
4.2.20.2	Shutdown cylinder EXTENDED	/	/	/
4.2.20.3	Cylinder retracted and VENTED	/	/	/
4.2.20.4	Contact OPEN	/	/	/
4.2.20.5	Contact CLOSED	/	/	/
4.2.20.6	Unit running light DE-ENERGIZED	/	/	/
4.2.20.7	Contact OPEN	/	/	/
4.2.20.8	Contact OPEN	/	/	/
4.2.20.9	Contact OPEN	/	/	/
4.2.21.1	Maintenance mode alarm ENERGIZED	/	/	/
4.2.22.1	Maintenance mode alarm DE-ENERGIZED	/	/	/
4.2.24.1	125VDC PRESENT	DR 1/3/29/90	QC HOLD POINT	1/3/28/90
4.2.24.2.1	Maintenance mode alarm DE-ENERGIZED	RAJ 3/29/90	No	1/3/28/90 1/3/29/90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.24.3	Contact CLOSED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.4	Relays ENERGIZED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.5	Contact CLOSED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.6	Safety injection signal light ENERGIZED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.7	Shutdown light DE-ENERGIZED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.8	No voltage on solenoid	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.9	Jumper REMOVED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.24.10	EMERGENCY start alarm ENERGIZED	ZAJ 13/29/90	NO	13/29/90
4.2.24.11	Contact CLOSED	N/AC 10/13/20/90		
4.2.24.12	Contact CLOSED	N/AC 10/13/20/90		
4.2.25.1	Stopping light DE-ENERGIZED	ZAJ 13/29/90		
4.2.26.1	Pressure gauge below 25 PSI	ZAJ 13/29/90		
4.2.26.2	Shutdown cylinder NOT EXTENDED	ZAJ 13/29/90		
4.2.26.3	Hi temp lube oil alarm ENERGIZED	ZAJ 13/29/90	OC HOLD POINT	13/29/90
4.2.26.4	Stopping light NOT ENERGIZED	ZAJ 13/29/90	NO	13/29/90
4.2.26.5	Contact CLOSED	N/AC 10/13/20/90		
4.2.26.6	Contact CLOSED annunciator "ON"	N/AC 10/13/20/90		
4.2.27	Tubing E-18 RECONNECTED	ZAJ 13/29/90	OC HOLD POINT	13/29/90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	OC INIT/DATE
4.2.27.1	Group 1 pressure gauge 60 PSI	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13/29/90</u>
4.2.27.2	Hi temp alarm DE-ENERGIZED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13/29/90</u>
4.2.27.3	Contact OPEN	<u>N/A CSP 13/28/90</u>	No	<u>JKL 13-28-90</u>
4.2.27.4	Contact OPEN	<u>N/A CSP 13/28/90</u>	↓	↓
4.2.28.1	Stopping light ENERGIZED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13/29/90</u>
4.2.28.2	Lo pressure alarm ENERGIZED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13/29/90</u>
4.2.28.3	Contact CLOSED	<u>N/A CSP 13/28/90</u>	No	<u>JKL 13-28-90</u>
4.2.28.4	Contact CLOSED	<u>N/A CSP 13/28/90</u>	↓	↓ -1
4.2.28.5	Engine shutdown Cylinder EXTENDED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13-29-90</u>
4.2.29.1	Maintenance mode alarm DE-ENERGIZED	<u>ZAJ 13/29/90</u>	No	<u>JKL 13-28-90</u>
4.2.30	Plug installed on E-92	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13-29-90</u>
4.2.30.1	Relay R11B ENERGIZED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13-29-90</u>
4.2.30.1.1	Contact CLOSED	<u>N/A CSP 13/28/90</u>	No	<u>JKL 13-28-90</u>
4.2.30.1.2	Contact CLOSED	↓	↓	↓
4.2.30.1.3	Contact CLOSED	↓	↓	↓
4.2.30.1.4	Ready to load light ENERGIZED	<u>ZAJ 13/29/90</u>	OC HOLD POINT	<u>JKL 13-29-90</u>
4.2.30.2	Jumper Removed	<u>ZAJ 13/29/90</u>	No	<u>JKL 13-28-90</u>
4.2.30.2.1	Contact OPEN	<u>ZAJ 13/29/90</u>	↓	↓
4.2.30.2.2	Contact OPEN	<u>ZAJ 13/29/90</u>	↓	↓

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.30.2.3	Contact OPEN	N/ACJP 13/28/90	NO	KU 13/28/90
4.2.30.2.4	Ready to load light DE-ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90
4.2.31.1	No voltage PRESENT	RAJ 13/29/90	HOLD POINT	KU 13-29-90
4.2.31.2	Relay R-5B ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90
4.2.32.1	Relay R-23B ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90
4.2.32.2	Contact CLOSED	N/ACJP 13/28/90	NO	KU 13/28/90
4.2.32.3	Contact CLOSED			
4.2.32.4	Contact CLOSED			
4.2.32.5	Contact CLOSED			
4.2.32.6	Emergency Stop ENERGIZED	RAJ 13/29/90		
4.2.32.7	Stopping light ENERGIZED	RAJ 13/29/90		
4.2.32.8	Pressure at Solenoid 3B	RAJ 13/29/90		
4.2.32.9	Unit available light DE-ENERGIZED	RAJ 13/29/90		
4.2.32.9.1	No change in status light	RAJ 13/29/90		
4.2.32.10	Overspeed alarm ENERGIZED	RAJ 13/29/90		
4.2.32.11	Contact CLOSED	N/ACJP 13/28/90	↓	↓
4.2.32.12	Relay R-35 ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90
4.2.32.12.1.1	Relay R-35 ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90
4.2.32.12.1.2	Emergency trip DE-ENERGIZED	RAJ 13/29/90	OC HOLD POINT	KU 13-29-90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	OC INIT/DATE
4.2.32.13.1	No voltage present	ZAT 13-27-90	No	JK 13-28-90
4.2.32.13.2	No voltage present	ZAT 13-24-90		
4.2.33	Cover INSTALLED	ZAT 13-27-90		
4.2.35.1	Contact OPEN	N/A CJP 13/29/90		
4.2.35.2	Overspeed trip DE-ENERGIZED	ZAT 13-27-90	OC HOLD POINT	JK 13-28-90
4.2.35.3	Contact OPEN	N/A CJP 13/29/90	No	JK 13-28-90
4.2.36.1	Relay R23B DE-ENERGIZED	ZAT 13-27-90	OC HOLD POINT	JK 13-29-90
4.2.36.2	Contact OPEN	N/A CJP 13/29/90	No	JK 13-28-90
4.2.36.3	Contact OPEN			
4.2.36.4	Contact OPEN			
4.2.36.5	Emergency stop light DE-ENERGIZED	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.36.6	Stopping light DE-ENERGIZED	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.36.7	Relay R-35 DE-ENERGIZED	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.37.1	125VDC present	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.37.2	DG Auto start signal ENERGIZED	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.38.1	No voltage present	ZAT 13/27/90	No	JK 13-28-90
4.2.38.2	DG Auto start signal DE-ENERGIZED	ZAT 13/27/90		
4.2.39.1	Contact CLOSED	N/A CJP 13/29/90		
4.2.39.2.1	Relay R23B ENERGIZED	ZAT 13/27/90	OC HOLD POINT	JK 13-29-90
4.2.39.2.2	Contact CLOSED	N/A CJP 13/29/90	No	JK 13-28-90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	OC INIT/DATE
4.2.39.2.3	Contact CLOSED	N/A CJP 13/24/90	NO	JCU 13/28/90
4.2.41.1	Emergency trip alarm is ENERGIZED	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90
4.2.41.2	Contact CLOSED	N/A CJP 13/28/90	NO	JCU 13/28/90
4.2.41.3	Relay R-35 ENERGIZED	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90
4.2.42.1	Emergency trip alarm DE-ENERGIZED	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90
4.2.42.2	Contact OPEN	N/A CJP 13/28/90	NO	JCU 13/28/90
4.2.42.3	Relay R-35 DE-ENERGIZED	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90
4.2.44	Jumper Disconnected	DJP 13/29/90	NO	JCU 13/29/90
4.2.45.1	125VDC across solenoid 202-6A	N/A CJP 13/28/90		
4.2.45.2	Power available light ENERGIZED			
4.2.45.3	Annunciator DE-ENERGIZED			
4.2.45.4	Contact OPEN			
4.2.46.1	No voltage across solenoid 202-6B	DJP 13/29/90		
4.2.46.2	Power available light DE-ENERGIZED	DJP 13/29/90		
4.2.46.3	Power "B" failure ALARM ENERGIZED	DJP 13/29/90		
4.2.46.4	CONTACT CLOSED	N/A CJP 13/28/90		
4.2.48.1	125VDC PRESENT	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90
4.2.48.2	FAILURE TO START ALARM ENERGIZED	DJP 13/29/90	OC HOLD POINT	JCU 13-29-90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.49.1	No voltage present	DJP 13/29/90	OC HOLD POINT	10/13/29/90
4.2.49.2	CONTACT CLOSED	N/A CJP 13/28/90		
4.2.49.3	OPEN CIRCUIT	↓		N/A 13/28/90
4.2.49.4	CONTACT CLOSED	↓		
4.2.49.4	CONTACT CLOSED	↓		
4.2.49.5	STARTING LIGHT ENERGIZED	DJP 13/29/90	OC HOLD POINT	10/13/29/90
4.2.49.6	Relay R1 ENERGIZED	DJP 13/29/90	OC HOLD POINT	10/13/29/90
4.2.49.7	RUNNING LIGHT ENERGIZED	DJP 13/29/90	OC HOLD POINT	10/13/29/90
4.2.50.1	SHUTDOWN CYLINDER EXTENDED	DJP 13/29/90	OC HOLD POINT	10/13/29/90
4.2.50.2	Contact Closure	N/A CJP 13/28/90	NO	10/13/28/90
4.2.50.3	High Temperature trip ENERGIZED	DJP 13/29/90		
4.2.50.4	OPEN CIRCUIT	N/A CJP 13/28/90		
4.2.50.5	Relay R1, R1AUX, and R2 are reset	DJP 13/29/90		
4.2.50.6	Contact Closed	N/A CJP 13/28/90		
4.2.50.7	Contact closed	↓		
4.2.50.8	Unit running light DE-ENERGIZED	DJP 13/29/90		
4.2.50.9	Stopping light ENERGIZED	DJP 13/29/90		
4.2.50.10	Contact CLOSED	N/A CJP 13/28/90		
4.2.50.11	CONTACT CLOSED	↓		
4.2.51.1	Hi bearing temp ALARM DE-ENERGIZED	DJP 13/29/90	OC HOLD POINT	10/13/29/90

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PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.51.2	CONTACT OPEN	<u>N/A 1/13/20/90</u>	<u>NO</u>	<u>1/13/28/90</u>
4.2.51.3	CONTACT OPEN	<u>↓</u>	<u>↓</u>	<u>↓</u>
4.2.53.1	125V DC PRESENT	<u>DSP 13/29/90</u>	<u>QC HOLD POINT</u>	<u>1/13/29/90</u>
4.2.53.2	CONTACT CLOSED	<u>N/A 1/13/20/90</u>	<u>NO</u>	<u>1/13/28/90</u>
4.2.53.3	RELAYS R1, R1A R2, ENERGIZED	<u>DSP 1/24/90</u>		
4.2.53.4	SHUTDOWN SYSTEM ACTIVE Light DE-ENERGIZED	<u>DSP 13/29/90</u>		
4.2.53.5	NO VOLTAGE PRESENT	<u>DSP 13/24/90</u>		
4.2.53.6	Jumper Removed	<u>DSP 1/24/90</u>		
4.2.53.7	Contact CLOSED	<u>N/A 1/13/20/90</u>		
4.2.54.1	H1 Pressure Alarm ENERGIZED	<u>DSP 13/29/90</u>		
4.2.54.2	ENGINE SHUTDOWN CYLINDER NOT EXTENDED	<u>DSP 13/29/90</u>		
4.2.54.3	CONTACT CLOSED	<u>N/A 1/13/20/90</u>		
4.2.54.4	CONTACT CLOSED	<u>↓</u>	<u>↓</u>	<u>↓</u>
4.2.55	TUBING Z-68 RECONNECTED	<u>DSP 13/24/90</u>	<u>QC HOLD POINT</u>	<u>1/13/29/90</u>
4.2.55.1	H1 Pressure Alarm DE-ENERGIZED	<u>DSP 13/29/90</u>	<u>QC HOLD POINT</u>	<u>1/13/29/90</u>
4.2.55.2	CONTACT OPEN	<u>N/A 1/13/20/90</u>	<u>NO</u>	<u>1/13/25/90</u>
4.2.55.3	CONTACT OPEN	<u>↓</u>	<u>↓</u>	<u>↓</u>
4.2.55.4	SHUTDOWN CYLINDER NOT EXTENDED	<u>DSP 13/29/90</u>	<u>QC HOLD POINT</u>	<u>1/13/29/90</u>
4.2.56.1	No voltage present	<u>DSP 13/29/90</u>	<u>NO</u>	<u>1/13/29/90</u>

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.56.2	CONTACT CLOSED	N/A CIP 13/28/90	No	INT 13/28/90
4.2.56.3	SHUTDOWN CYLINDER EXTENDED	DIP 13/29/90		
4.2.56.4	VIBRATION ALARM ENERGIZED	DIP 13/29/90		
4.2.56.5	CONTACT CLOSED	N/A CIP 13/28/90		
4.2.56.6	CONTACT CLOSED	↓		
4.2.56.7	CONTACT OPEN	↓		
4.2.57	TUBING E-23-E RECONNECTED	DIP 13/29/90	QC HOLD POINT	INT 13/29/90
4.2.57.1	VIBRATION ALARM DE-ENERGIZED	DIP 13/29/90	QC HOLD POINT	INT 13/29/90
4.2.57.2	CONTACT OPEN	N/A CIP 13/28/90	No	INT 13/28/90
4.2.57.3	CONTACT OPEN	↓		
4.2.58.1	Jacket Water Lo PRESSURE ENERGIZED	DIP 13/29/90		
4.2.58.2	ENGINE SHUTDOWN CYLINDER EXTENDED	DIP 13/29/90		
4.2.58.3	CONTACT CLOSED	N/A CIP 13/28/90		
4.2.58.4	CONTACT CLOSED	↓		
4.2.58.5	CONTACT CLOSED	↓		
4.2.58.6	CONTACT CLOSED	↓		
4.2.58.7	CONTACT CLOSED	↓		
4.2.59	TUBING E-14 RECONNECTED	DIP 13/29/90	QC HOLD POINT	INT 13/29/90
4.2.59.1	JACKET WATER ALARM DE-ENERGIZED	DIP 13/29/90	QC HOLD POINT	INT 13/29/90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	OC INIT/DATE
4.2.59.2	CONTACT OPEN	<u>NA</u> 1/13/2000	/	/
4.2.59.3	CONTACT OPEN	/	/	/
4.2.60.1	RELAY R-11A ENERGIZED	/	/	/
4.2.60.2	CONTACT CLOSED	/	/	/
4.2.60.3	CONTACT CLOSED	/	/	/
4.2.60.4	READY TO LOAD LIGHT ENERGIZED	/	/	/
4.2.60.5	CONTACT OPEN	/	/	/
4.2.60.6	CONTACT OPEN	/	/	/
4.2.60.7	READY TO LOAD LIGHT DE-ENERGIZED	/	/	<u>NA</u> 1/13/2000
4.2.60.8	JUMPER REMOVED	/	/	/
4.2.61.1	125VDC PRESENT	/	/	/
4.2.61.2	CONTACT CLOSED	/	/	/
4.2.61.3	AUTO START LIGHT ENERGIZED	/	/	/
4.2.62	REMOVE JUMPER	/	/	/
4.2.62.1	NO VOLTAGE PRESENT	/	/	/
4.2.62.2	CONTACT OPEN	/	/	/
4.2.62.3	AUTO START	/	/	/
4.2.63.1	UNIT AVAILABLE LIGHT DE-ENERGIZED	/	/	/
4.2.63.2	POWER FAILURE ALARM ENERGIZED	/	/	/
4.2.63.3	CONTACT CLOSED	<u>NA</u> /	/	/

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	OC INIT/DATE
4.2.64.1	UNIT AVAILABLE STATUS LIGHT ENERGIZED	DIP 13/29/00	OC HOLD POINT	15-29-90
4.2.64.2	START POWER FAILURE ALARM DE-ENERGIZED	DIP 13/29/00	OC HOLD POINT	15-29-90
4.2.64.3	CONTACT OPEN	N/A CIP 13/28/90	No	13/28/90
4.2.65.1	PRESSURE SENSOR MALFUNCTION ALARM ENERGIZED	DIP 13/29/00		
4.2.65.2	CONTACT CLOSED	N/A CIP 13/28/90		
4.2.65.3	TUBING E-10B DISCONNECTED	DIP 13/29/00		
4.2.65.4	LUBE OIL ALARM ENERGIZED	DIP 13/29/00		
4.2.65.5	PRESSURE SENSOR MALFUNCTION ALARM DE-ENERGIZED	DIP 13/29/00		
4.2.65.6	CONTACT CLOSED	N/A CIP 13/28/90		
4.2.65.7	CONTACT CLOSED			
4.2.65.8	CONTACT OPEN			
4.2.65.9	RELAY R23B DEENERGIZED	DIP 13/29/00		
4.2.66.1	RELAY R23B DEENERGIZED	DIP 13/29/00	OC HOLD POINT	15-29-90
4.2.66.2	CONTACT OPEN	N/A CIP 13/28/90	No	13/28/90
4.2.66.3	CONTACT OPEN			
4.2.67.1	MALFUNCTION ALARM ENERGIZED	DIP 13/29/00		
4.2.67.2.	PLUG REMOVED FROM TUBING E-10C	DIP 13/29/00		

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.67.2.1	LO OIL PRESSURE ALARM DE-ENERGIZED	DJP 13/20/90	No	JLR 13/28/90
4.2.67.2.2	LUBE OIL SHUTDOWN ALARM ENERGIZED	DJP 13/29/90		
4.2.67.2.3	CONTACT CLOSED	N/A CJP 13/28/90		
4.2.69.1	MALFUNCTION ALARM ENERGIZED	DJP 13/29/90		
4.2.69.2	PLUG E-10A DISCONNECTED	DJP 13/20/90		
4.2.69.2.1	LUBE OIL SHUTDOWN ALARM ENERGIZED	DJP 13/29/90		
4.2.70	PLUGS RECONNECTED TO TUBING E10A and E10C	DJP 13/29/90		
4.2.71.1	JACKET WATER TEMP SENSOR MALFUNCTION ALARM ENERGIZED	DJP 13/20/90		
4.2.71.2	CONTACT CLOSED	N/A CJP 13/28/90		
4.2.71.3	Disconnect Tubing E-16B	DJP 13/29/90		
4.2.71.3.1	TEMP SENSOR MALFUNCTION ALARM DE-ENERGIZED	DJP 13/29/90		
4.2.71.3.2	JACKET WATER TEMP SHUTDOWN ALARM ENERGIZED	DJP 13/20/90		
4.2.71.3.3	CONTACT CLOSED	N/A CJP 13/28/90		
4.2.71.3.4	CONTACT OPEN	DJP 13/29/90		
4.2.72	TUBING E-16A and E-16B RECONNECTED	DJP 13/29/90	QC HOLD POINT	JLR 13-29-90
4.2.73	E16-B Disconnected	DJP 13/29/90	No	JLR 13/28/90

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.73.1	Hi Temp. JACKET WATER ALARM DE-ENERGIZED	DJP 13/29/90	NO	JCH 13/28/90
4.2.73.2	CONTACT OPEN	N/A CIP 13/29/90		
4.2.73.3	CONTACT OPEN	↓		
4.2.73.4	TEMP. SENSOR MALFUNCTION ALARM	DJP 13/29/90		
4.2.73.5	TUBING E16-C Disconnected	DJP 13/29/90		
4.2.73.5.1	Jacket Water Shutdown ALARM ENERGIZED	DJP 13/29/90	↓	↓
4.2.74	TUBING LINES E16-B AND C RECONNECTED	DJP 13/29/90	OC HOLD POINT	JW 13-29-90
4.2.75	Disconnect Tubing E16-C	DJP 13/29/90	NO	JCH 13/28/90
4.2.75.1	SENSOR MALFUNCTION ALARM	DJP 13/29/90		
4.2.75.2	TUBING E16-A Disconnected	DJP 13/29/90		
4.2.75.2.1	JACKETWATERS SHUTDOWN ALARM	DJP 13/29/90	↓	↓
4.2.76	TUBING E16-A and C RECONNECTED	DJP 13/29/90	OC HOLD POINT	JW 13-29-90
4.2.77.1	PRESSURE GAUGE READING LESS THAN 25PSI	DJP 13/29/90	OC HOLD POINT	JW 13-29-90
4.2.77.2	BYPASS TEST FAILURE LIGHT DE-ENERGIZED	DJP 13/29/90	OC HOLD POINT	JW 13-29-90
4.2.77.3.1	BYPASS TEST FAILURE LIGHT ENERGIZED	DJP 13/29/90	OC HOLD POINT	JW 13-29-90
4.2.78.1	SUMP TANK READING O.K.	N/A CIP 13/29/90	NO	JCH 13/28/90

<u>PROCEDURE STEP</u>	<u>DESCRIPTION</u>	<u>MAINT. INIT/DATE</u>	<u>HOLD POINT (Yes/No)</u>	<u>QC INIT/DATE</u>
4.2.79.1	DAY TANK READING O.K.	NACJP/3/23/90	/	/
4.2.80.1	ALARMS ENERGIZED	/	/	/
4.2.80.2	Horn Disconnected	/	/	/
4.2.82.1	LUBE OIL FILTER DIFFERENTIAL HIGH FUNCTIONS	/	/	/
4.2.82.1.1	ALARM FUNCTIONS Correctly	/	/	/
4.2.82.1.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.1.3	CONTACT CLOSED	/	/	/
4.2.82.2.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.2.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.3.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.3.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.4.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.4.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.5.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.6.1	ALARM FUNCTION CORRECTLY	/	/	/
4.2.82.7.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.8.1	ALARM FUNCTIONS CORRECTLY	/	/	/

12/1/90

<u>PROCEDURE STEP</u>	<u>DESCRIPTION</u>	<u>MAINT. INIT/DATE</u>	<u>HOLD POINT (Yes/No)</u>	<u>QC INIT/DATE</u>
4.2.82.9.1	ALARM FUNCTIONS CORRECTLY	N/ACP 12/18/93	/	/
4.2.82.9.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.10.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.10.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.11.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.11.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.12.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.12.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.13.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.14.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.15.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.16.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.17.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.17.2	RELAY R35 ENERGIZED	/	/	/
4.2.82.18.1	ALARM FUNCTIONS CORRECTLY	/	/	/

✓ WA 10/13/92

<u>PROCEDURE STEP</u>	<u>DESCRIPTION</u>	<u>MAINT. INIT/DATE</u>	<u>HOLD POINT (Yes/No)</u>	<u>QC INIT/DATE</u>
4.2.82.19.1	ALARM FUNCTIONS CORRECTLY	1/16/13/28/20	/	/
4.2.82.20.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.20.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.21.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.22.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.22.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.23.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.23.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.24.1	ALARM FUNCTIONS CORRECTLY	/	/	1/3/28/20
4.2.82.25.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.26.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.26.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.27.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.27.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.28.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.28.2	RELAY R38 ENERGIZED	✓	/	/

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.82.29.1	ALARM FUNCTIONS CORRECTLY	N/ACV 13/28/70	/	/
4.2.82.29.2	RELAY R38 ENERGIZED	/	/	/
4.2.82.30.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.31.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.31.2	RELAY R20 ENERGIZED CONTACT CLOSED	/	/	/
4.2.82.32.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.33.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.33.2	EMERGENCY STATUS LIGHT DE-ENERGIZED	/	MA 10/13/82	/
4.2.82.34.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.35.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.35.2	CONTACT CLOSED	/	/	/
4.2.82.36.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.36.2	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.37.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.38.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.39.1	ALARM FUNCTIONS CORRECTLY	/	/	/

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.82.40.1	ALARM FUNCTIONS CORRECTLY	1/28/90	/	/
4.2.82.41.1	ALARM FUNCTIONS CORRECTLY	/	/	/
4.2.82.42	RELAYS INSTALLED	/	/	/
4.2.83	RELAY RESET	/	/	/
4.2.84.1	NO PRESSURE AT L.B. GAUGE	/	/	/
4.2.84.2.1	120 VDC PRESENT	/	/	/
4.2.84.3.1	120 VDC PRESENT	/	/	/
4.2.85.1	PRESSURE AT R.B. GAUGE	/	/	/
4.2.85.2	NO PRESSURE AT LB GAUGE	/	/	/
4.2.85.3.1	NO VOLTAGE PRESENT	/	/	/
4.2.85.4.1	NO VOLTAGE PRESENT	/	/	/
4.2.87.1	CONTACT CLOSED	/	/	/
4.2.87.2	CONTACT CLOSED	/	/	/
4.2.88.1	CONTACT OPEN	/	/	/
4.2.88.2	CONTACT OPEN	/	/	/
4.2.89.1	TUBING RECONNECTED	1/29/90	OC HOLD POINT	2/15/90
4.2.89.2	TUBING RECONNECTED	/	OC HOLD POINT	2/15/90
4.2.89.3	TUBING RECONNECTED	/	OC HOLD POINT	2/15/90
4.2.90	TUBING RECONNECTED	/	OC HOLD POINT	2/15/90
4.2.91	TUBING RECONNECTED	1/29/90	OC HOLD POINT	2/15/90

AE
BUSINESS
UNIT
for
William
ser JR
34172

PROCEDURE
STEP

DESCRIPTION

MAINT.
INIT/DATE

HOLD
POINT
(Yes/No)

QC
INIT/DATE

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.92.1	LINKS CLOSED	DJP 12/27/40	NO	1/3/20/80
4.2.92.2	LINKS CLOSED	/	/	/
4.2.92.3	LINKS CLOSED	/	/	/
4.2.92.4	LINKS CLOSED	/	/	/
4.2.92.5	LINKS CLOSED	/	/	/
4.2.92.6	LINKS CLOSED	/	/	/
4.2.92.7	LINKS CLOSED	/	/	/
4.2.92.8	LINKS CLOSED	/	/	/
4.2.92.9	LINKS CLOSED	/	/	/
4.2.92.10	LINKS CLOSED	/	/	/
4.2.92.11	LINKS CLOSED	/	/	/
4.2.92.12	LINKS CLOSED	/	/	/
4.2.92.13	LINKS CLOSED	/	/	/
4.2.92.14	LINKS CLOSED	/	/	/
4.2.92.15	LINKS CLOSED	/	/	/
4.2.92.16	LINKS CLOSED	/	/	/
4.2.92.17	LINKS CLOSED	/	/	/
4.2.92.18	LINKS CLOSED	/	/	/
4.2.92.19	LINKS CLOSED	/	/	/
4.2.92.20	LINKS CLOSED	/	/	/
4.2.92.21	LINKS CLOSED	/	/	/
4.2.92.22	LINKS CLOSED	/	/	/

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.92.23	LINKS CLOSED	DR 13/29/90	No	DR 13/28/90
4.2.92.24	LINKS CLOSED	/	/	/
4.2.92.25	LINKS CLOSED	/	/	/
4.2.92.26	LINKS CLOSED	/	/	/
4.2.92.27	LINKS CLOSED	/	/	/
4.2.92.28	LINKS CLOSED	/	/	/
4.2.92.29	LINKS CLOSED	/	/	/
4.2.92.30	LINKS CLOSED	/	/	/
4.2.92.31	LINKS CLOSED	/	/	/
4.2.92.32	LINKS CLOSED	/	/	/
4.2.92.33	LINKS CLOSED	/	/	/
4.2.92.34	LINKS CLOSED	/	/	/
4.2.92.35	LINKS CLOSED	/	/	/
4.2.92.36	LINKS CLOSED	/	/	/
4.2.92.37	LINKS CLOSED	/	/	/
4.2.93	TOGGLE SWITCHES OPEN	DR 13/29/90	No	DR 13/28/90
4.2.94	ENGINE WIRE RECONNECTED	DR 13/29/90	QC HOLD POINT	DR 13/28/90
4.2.95	ENGINE WIRE RECONNECTED	DR 13/29/90	QC HOLD POINT	DR 13/28/90
4.2.96	WIRE 402 RECONNECTED	DR 13/28/90	No	DR 13/28/90
4.2.97	JUMPER REMOVE	DR 13/29/90	/	/

PROCEDURE STEP	DESCRIPTION	MAINT. INIT/DATE	HOLD POINT (Yes/No)	QC INIT/DATE
4.2.98	JUMPER REMOVE	<u>DJP 13/29/90</u>	<u>No</u>	<u>JCH 13/28/90</u>
4.2.99	FREQUENCY GENERATOR REMOVED	<u>DJP 13/29/90</u>		
4.2.100	EQUIPMENT RESTORED TO OPERATIONAL CONDITION	<u>RAT 13-29-90</u>		
4.2.101	SHIFT SUPERVISOR NOTIFIED	<u>RAT 13-29-90</u>		

Comments/Additional Hold Points T.R. 34/72

QC has reviewed this procedure for Hold Points J.C. HANN 3-28-97
SIGNATURE

APPROVED DISAPPROVED
FOREMAN [Signature] DATE 3-29-90

COMPLETED BY [Signature] DATE 3-29-90