

FPL Energy

Seabrook Station

JOB PERFORMANCE MEASURE L0105J

TECHNICAL SPECIFICATIONS AND ALLOWED OUTAGE TIME (AOT)

Student Name: _____ Badge #: _____

Evaluator Name: _____ Badge #: _____

Student Signature: _____ Date: _____
(optional)

Evaluator Signature: _____ Date: _____

Training Specialist Signature: _____ Date: _____

SAT UNSAT

This JPM was administered for qualification: NO

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PREPARED BY: [Signature] DATE: 12/09/04
INSTRUCTOR

REVIEWED BY: NA DATE: _____
SUBJECT MATTER EXPERT (OPTIONAL)

APPROVED BY: [Signature] DATE: 12/19/04
TRAINING SUPERVISOR

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: SRO

1190401203 Clarify TSs and application of action statement requirements.

2.0 Conditions:

- A. The plant has just completed a heatup to 557°F from COLD SHUTDOWN.
- B. At 0700 this morning, the turbine-driven EFW (TDEFW) pump was declared INOPERABLE due to improperly installed mechanical seals in the pump.
- C. The plant is required to be in MODE 4 at 1300 (1:00 PM) three days from now if the TDEFW pump is not repaired.
- D. Based on an OE4.5, OPERABILITY DETERMINATION, the SM declared DG B INOPERABLE at 0800.

3.0 Standards:

Determine whether the INOPERABLE DG has further restricted MODE 3 operation.

4.0 Student Materials:

Copy of the Tear-Off Sheet
ODI.30, ALLOWED OUTAGE TIME WORKSHEET, Rev. 05
Technical Specifications

5.0 Limitations on performance:

Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures

ODI-30 ALLOWED OUTAGE TIME WORKSHEET

Technical Specifications

- 3.7.1.2, Auxiliary Feedwater System
- 3.8.1.1, AC Sources, Operating

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

Manuals

ODI 30, Allowed Outage Time Worksheet

Sys	KA	Description	Value SRO
GEN	2.1.12	Ability to apply Technical Specifications for a system.	4.0
GEN	2.1.22	Ability to determine Mode of Operation	3.3

7.0 Setting:

Classroom, simulator, or plant

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

30 minutes

10.0 Directions to the Student(s):

Evaluator gives Tear-Off sheet to the student

Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

A. You are the Work Control Supervisor.

B. The following information is provided to you:

1. The plant has just completed a heatup to 557°F from COLD SHUTDOWN.
2. At 0700 this morning, the turbine-driven EFW (TDEFW) pump was declared INOPERABLE due to improperly installed mechanical seals in the pump.
3. The plant is required to be in MODE 4 at 1300 (1:00 PM) three days from now if the TDEFW pump is not repaired. Technical Specification ACTION 3.7.1.2.b has been entered.
4. Based on an OE4.5, OPERABILITY DETERMINATION, the SM declared DG B INOPERABLE at 0800.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- C. The performance must meet the following standard:
 - 4. Determine whether the INOPERABILITY of DG B reduces the time allowed to remain in MODE 3 and if so;
 - 2. Determine the time required to be in MODE 4 and / or MODE 5, as applicable.
- D. Perform the task per Technical Specification ACTION Statements and ODI 30, AOT WORKSHEET(s).
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. During the course of the walk-through examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete
- I. We will begin after the Initiating Cue is read.
- J. I will act as the SM and provide the cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

SM to WCS, **"Work Control Supervisor (or student's name), DETERMINE which TS ACTION Statement(s) apply and, using ODI-30, DETERMINE the allowed outage times for each Technical Specification and MODE restrictions."**

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

1.	P	Start time	Initiating cue read.			_____
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CUE: If student requests time T.S. entered, "TS 3.8.1.1.bravo and delta were entered at 0800 hours. It is now 0820 hours."

NOTE: The date for the AOT worksheet is today's date.

*2.	P	Refers to ODI 30 to calculate AOT:	Calculates AOT			
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		Determine the appropriate AOT worksheet using Figure 1, AOT Flowchart, as a guide for LCO 3.8.1.1.b:	Determines ODI.30A is form to be used from FIGURE 1:			_____
--	--	--	--	--	--	-------

		• Is the LCO in question shown on list A?	* • Determines NO.			_____
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		• Is the LCO in question 3.0.3?	* • Determines NO.			_____
--	--	---------------------------------	--------------------	--	--	-------

		• Does TS Ultimately require Shutdown to COLD SHUTDOWN?	* • Determines YES.			_____
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*3	P	Enter information as required on Form ODI.30A, as appropriate.	b. Enters LCO specific information on form ODI.30A for 3.8.1.1.b:			_____
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		• Enters LCO info ⇒ Hrs AOT provided before MODE reduction to MODE 3 required	* ⇒ (a)=72			_____
--	--	--	------------	--	--	-------

		⇒ Hrs provided to change MODEs to MODE 3	• ⇒ (b)=0			_____
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	
		⇒ Hrs additional AOT provided in MODE 3 before reduction to MODE 4 or 5 required	⇒ Circles MODE 5 * ⇒ (c)=0	_____	_____	
		⇒ Hrs provided to change MODEs from MODE 3 to MODE 4 or 5	⇒ Circles MODE 5 * ⇒ (d)=30	_____	_____	
*4.	P	1) Time LCO action statement entered	1) Enters 0800 and today's date on line 1 (e).	_____	_____	_____
5	P	IF Entered From MODE ... (Circle Applicable)	Circles MODE 3	_____	_____	_____
*6.		Based on entry from MODE 3, proceed to Line 7.	• Proceeds to Line 7	_____	_____	_____
7.	P	Determine time and date that plant must be in MODE 5.	* Determines time and date to be in MODE 5 as 102 hours from entry into the TS.	_____	_____	_____
*8.		Determine the appropriate AOT worksheet using Figure 1, AOT Flowchart, as a guide for LCO 3.8.1.1.d:	Determines ODI.30A is form to be used from FIGURE 1:	_____	_____	_____
		• Is the LCO in question shown on list A?	* • Determines NO.	_____	_____	
		• Is the LCO in question 3.0.3?.	* • Determines NO.	_____	_____	
		• Does TS Ultimately require Shutdown to COLD SHUTDOWN?	* • Determines YES.	_____	_____	

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	
*9	P	Enter information as required on Form ODI.30A, as appropriate. <ul style="list-style-type: none"> • Enters LCO info <ul style="list-style-type: none"> ⇒ Hrs AOT provided before MODE reduction to MODE 3 required ⇒ Hrs provided to change MODEs to MODE 3 ⇒ Hrs additional AOT provided in MODE 3 before reduction to MODE 4 or 5 required ⇒ Hrs provided to change MODEs from MODE 3 to MODE 4 or 5 	b. Enters LCO specific information on form ODI.30A for 3.8.1.1.d: <ul style="list-style-type: none"> * ⇒ (a)= 2 * ⇒ (b)=0 ⇒ Circles MODE 5 * ⇒ (c)=0 ⇒ Circles MODE 5 * ⇒ (d)=30 			
*10.	P	1) Time LCO action statement entered	1) Enters 0800 and today's date on line 1 (e).			
11	P	IF Entered From MODE ... (Circle Applicable)	Circles MODE 3			
*12.		Based on entry from MODE 3, proceed to Line 7.	* Proceeds to Line 7			
*13.	P	Determine time and date that plant must be in MODE 5.	* Determines time and date to be in MODE 5 as 30 - 32 hours from entry into the TS.			

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

*14.	P	Report that that plant must be in MODE 5 within 32 hours of entry into 3.8.1.1.d	* Reports that that plant must be in MODE 5 within 32 hours of entry into 3.8.1.1.d	_____	_____	_____
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CUE: "The JPM is complete."

15.		Stop time Evaluator calculates the time to complete the task.	Start - Stop time is \leq 30 minutes.	_____	_____	_____
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0105J

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are the Work Control Supervisor. You are going to determine whether the INOPERABLE DG has further restricted MODE 3 operation.
- B. The following information is provided to you:
1. The plant has just completed a startup to 557°F from COLD SHUTDOWN.
 2. At 0700 this morning, the turbine-driven EFW (TDEFW) pump was declared INOPERABLE due to improperly installed mechanical seals in the pump.
 3. The plant is required to be in MODE 4 at 1300 (1:00 PM) three days from now if the TDEFW pump is not repaired. Technical Specification ACTION 3.7.1.2.b has been entered.
 4. Based on an OE4.5, OPERABILITY DETERMINATION, the SM declared DG B INOPERABLE at 0800.
- C. The evaluator will act as the SM and provide the cues and communications for this JPM. Do you have any questions?

Initiating Cue:

SM to WCS, "**Work Control Supervisor (or student's name), DETERMINE which TS ACTION Statement(s) apply and, using ODI-30, DETERMINE the allowed outage times for each Technical Specification and MODE restrictions.**"

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

FPL

Seabrook Station

JOB PERFORMANCE MEASURE LOIT05

EVALUATE SHUTDOWN MARGIN RESULTS

Student Name: _____ Badge #: _____

Evaluator Name: _____ Badge #: _____

Student Signature: _____ Date: _____
(optional)

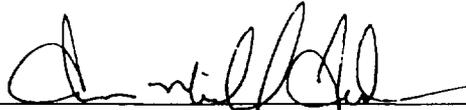
Evaluator Signature: _____ Date: _____

Training Coordinator Signature: _____ Date: _____
(optional)

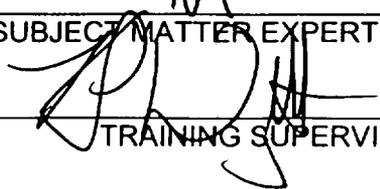
SAT UNSAT

This JPM was administered for qualification: YES NO

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PREPARED BY:  DATE: 12/09/04
INSTRUCTOR

REVIEWED BY:  DATE: _____
SUBJECT MATTER EXPERT (OPTIONAL)

APPROVED BY:  DATE: 12/9/04
TRAINING SUPERVISOR

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: RO

1190101802 Apply Technical Specification Actions to existing plant conditions.
0010100201 Perform Shutdown Margin Calculations.

2.0 Conditions:

- A. The plant is in Mode 1, EOL at 85% RTP, 300 ppm boron and stable.
- B. While withdrawing Control Bank D, it was determined that TWO control rods in this bank are misaligned.
- C. The actions of OS1210.06, "Misaligned Control Rod are being performed.
- D. It has further been determined that these two control rods will NOT move and are untrippable.
- E. A Shutdown Margin Calculation has been performed based on these plant conditions as required by TS 3.1.3.1.

3.0 Standards:

Evaluate shutdown margin results and determine impact on plant operations.

4.0 Student Materials:

Copy of the Tear-Off Sheet.
RX1707, Shutdown Margin Surveillance, Rev. 7 Chg. 04.
Primary Technical Data Book curves RE-8 Rev. 10-10-03, RE-18 Rev. 01-10-01, and RE-19 Rev. 10-13-03.
Seabrook Technical Specifications
OS 1210.06, "Misaligned Control Rod", Rev 9.
OS1210.02, "Failure of Control Rod or Bank to Move", Rev 9.
Core Operating Limits Report

5.0 Limitations on performance:

Simulate/Perform all steps. Verbalize all actions to the evaluator.
Even if requested, no Peer Checks will be provided during the JPM.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

6.0 References:

- RX1707, Shutdown Margin Surveillance.
-

Sys	KA	Description	Value RO/SRO
APE 005	AK1.05	Calculation of minimum shutdown margin.	3.3/4.1
GEN	2.1.7	Ability to evaluate plant performance and make operational judgments based on operating characteristics, reactor behavior, and instrument interpretation.	3.7/4.4
GEN	2.1.25	Ability to obtain and interpret station reference materials such as graphs, monographs, and tables which contain performance data.	2.8/3.1

7.0 Setting:

Classroom

1. Plant conditions, shutdown margin calculation, and applicable plant references are provided.

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

20 minutes

10.0 Directions to the Student(s):

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- A. You are going to evaluate Shutdown Margin results and determine impact on plant operations.
- B. The following information is provided to you:
 - 1. The plant is in Mode 1, EOL at 85% RTP, 300 ppm boron and stable.
 - 2. While withdrawing Control Bank D, it was determined that TWO control rods in this bank are misaligned.
 - 3. The actions of OS1210.06, "Misaligned Control Rod are being performed.
 - 4. It has further been determined that these two control rods will NOT move and are untrippable.
 - 5. A Shutdown Margin Calculation has been performed based on these plant conditions as required by TS 3.1.3.1.
- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task using RX1707, Shutdown Margin Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. I will act as the US and provide the cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

SM to US to student (or student's name), "**Based on given plant conditions, EVALUATE the Shutdown Margin Calculation for impact on given plant conditions and report findings to me upon completion**".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

NOTE: RE procedure RX1707, Technical Specifications, Abnormal Operating Procedures, Core Operating Limits Report & RE-8, RE-18, and RE-19 should be available upon the students request.

NOTE: The order of the following steps or the fact that all references are reviewed is not critical.

1. P Start time: _____ Initiating cue read. _____

CUE: If the student requests a Peer Check at any time during the JPM, respond: **“No one is available to peer check your actions. Please continue with the task”.**

CUE: If the student asks about rod heights, **“Rods are above the Rod Insertion Limit”.**

2.	P	Reviews the SDM Calculation provided and associated plant conditions.	Reviews the SDM Calculation provided and associated plant conditions.	_____	_____	_____
3.	P	Reviews RX1707, “Shutdown Margin Surveillance” procedure.	Reviews RX1707, “Shutdown Margin Surveillance” procedure.	_____	_____	_____
	P	May choose to review data that was used to determine SDM.	Reviews data associated with provided SDM calculation. (RE-8, 18, 19)	_____	_____	_____
5.	P	May choose to reference abnormal operating procedure associated with stated plant conditions	References OS 1210.06, “Misaligned Control Rod” and/or OS1210.02, “Failure of Control Rod or Bank to Move”.	_____	_____	_____
6.	P	Reviews COLR (RE-21)	References COLR to determine required SDM for Mode 1.	_____	_____	_____
*7.	P	Recognizes that required SDM is inadequate for given plant conditions.	* Recognizes 1.019 is less than the required 1.3 required SDM for given plant conditions.	_____	_____	_____

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

*8.	P	Determines TS 3.1.1.1 actions statement applies.	<ul style="list-style-type: none"> *Reports to the SM that TS 3.1.1.1 action statement applies due to inadequate SDM. *Immediately initiate boration equivalent to 30 gpm at a boron concentration greater than or equal to 7000 ppm until required SDM is restored. 	_____	_____	_____
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CUE: "The JPM is complete."

9.		Stop time Evaluator calculates the time to complete the task.	Time to complete the task ≤ 20 minutes.			_____
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0043J

Directions to the Student:

Evaluator gives Tear-Off sheet to the student

Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to calculate Shutdown Margin in Mode 1.
- B. The following information is provided to you:
1. The plant is in Mode 1, EOL at 85% RTP, 300 ppm boron and stable.
 2. While withdrawing Control Bank D, it was determined that TWO control rods in this bank are misaligned.
 3. The actions of OS1210.06, "Misaligned Control Rod are being performed.
 4. It has further been determined that these two control rods will NOT move and are untrippable.
 5. A Shutdown Margin Calculation has been performed based on these plant conditions as required by TS 3.1.3.1.
- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task as per RX1707, Shutdown Margin Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the US and provide the cues and communications for this JPM. Do you have any questions?

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0043J

Initiating Cue:

US to student (or student's name), "Based on given plant conditions, **EVALUATE the Shutdown Margin Calculation for impact on given plant conditions**" and report findings to me upon completion".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

LOIT05

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: WCS

1190403903 DETERMINE REQUIRED NOTIFICATIONS/TIME PERIODICITIES OF ON-SITE AND OFF-SITE PERSONNEL FOR OFF NORMAL EVENTS

2.0 Conditions:

A. The plant is performing a TS 3.0.3 shutdown due to INOPERABILITY of both centrifugal charging pumps (administratively INOPERABLE, both are available). The shutdown commenced at 0200 this morning. It is Saturday morning at 0210.

3.0 Standards:

Identify the required notifications and time periodicities in accordance with the Regulatory Compliance Manual (NARC) and Conduct of Operations (NAP-402).

4.0 Student Materials:

Copy of the Tear-Off Sheet
Regulatory Compliance Manual (NARC)
Conduct of Operations (NAP-402)

5.0 Limitations on performance:

Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures
Regulatory Compliance Manual (NARC)
Conduct of Operations (NAP-402)
Emergency Response Manual (SSER)
OS1000.06, POWER DECREASE

Sys	KA	Description	Value SRO
GEN	2.1.6	Ability to supervise and assume a management role during plant transients and upset conditions.	4.3
GEN	2.1.14	Knowledge of System Status criteria which require notification of plant personnel.	3.3
GEN	2.2.18	Knowledge of the process for managing maintenance activities during shutdown operations.	3.6

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

LOIT06

JOB PERFORMANCE WORKSHEET

7.0 **Setting:**

Plant / Classroom / Simulator

8.0 **Safety Considerations:**

IF performed in the plant, ensure both student and evaluator have proper PPE for entry into the plant.

9.0 **Approximate Completion Time:**

20 minutes

10.0 **Directions to the Student:**

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

A. You are the Work Control Supervisor.

B. The following information is provided to you:

The plant is performing a TS 3.0.3 shutdown due to INOPERABILITY of both centrifugal charging pumps (administratively INOPERABLE, both are available). The shutdown commenced at 0200 this morning. It is Saturday morning at 0210.

C. The performance must meet the following standard:

Identify the notifications required in accordance with the applicable program manuals.

D. Perform the task utilizing the applicable program manuals.

E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- F. During the course of the walk-through examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs) Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the SM and provides cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

SM to WCS, "I want to remain in an oversight role for the plant shutdown. Using the Immediate Notifications Tab in Section 3 of the Regulatory Compliance Manual (NARC) and Conduct of Operation (NAP-402, Attachment M), identify required notifications (and the time limits as applicable) as a result of the forced outage. The US or I will attend to the notifications identified in the MPEs."

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

1.	P	Start time	Initiating cue read.	_____	_____
----	---	------------	----------------------	-------	-------

NOTE: The student may refer to ER-1.1A to confirm there is no E-Plan implication. Also these procedures can be referenced in any order and are outlined separately below.

NARC ACTIONS Outlined Below

*2.	P	Refer to the IMMEDIATE NOTIFICATION tab and reporting requirements table in the NARC to identify the following:	Refers to the IMMEDIATE NOTIFICATION tab and reporting requirements table in the NARC:	_____	_____
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NOTE: The student might also state that an 8 hour notification to the NRC Operations Center is required based on an unanalyzed condition or system degradation which is less limiting than the 4 hour notification and also acceptable.

NRC Operations Center - within four hours	• Identifies notification to NRC Operations Center is required within 4 Hrs (Initiation of a TS required Shutdown)	_____	_____
---	--	-------	-------

CUE: If student wants to reference the OPMM, inform him it is not necessary.

OPS./ ASST. OPS. Mgr – ASAP/1 hour	* Identifies OPS./ ASST. OPS. Mgr – ASAP (any transient event/major equipment failure or due to the additional notifications section within 1 hour)	_____	_____
------------------------------------	---	-------	-------

.ote to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	
	NRC Resident Inspector – ASAP/1 hour	* Identifies NRC Resident Inspector – ASAP (when any 4 hour notification or less is reported to the NRC or due to the additional notification section within 1 hour)	_____	_____	_____
	Regulatory Compliance - ASAP	* Identifies Regulatory Compliance – ASAP (when any 4 hour notification or less is reported to the NRC)	_____	_____	_____
	FPLE Communications – ASAP/1 hour	* Identifies FPLE Communications – ASAP (any off-normal condition or due to the additional notifications section within 1 hour)	_____	_____	_____

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

NAP-402 Actions Outlined Below

*3.	P	Refers to NAP-402, Attachment M and identifies the following notifications	Refers to NAP-402, Attachment M and identifies the following notifications in any order:	_____	_____	_____
-----	---	--	--	-------	-------	-------

NOTE: It is also acceptable if the student identifies that the notifications based on any event or operating condition that occurs that is not enveloped in the plant design basis which overlaps the other requirements.

Identifies a Shutdown LCO action statement entry. Unplanned entry into a 72 hour or less shutdown action statement	*	Based on this criteria notifies: <ul style="list-style-type: none"> • Site VP • Plant Manager • Ops Manager • Nuclear Duty Officer • Duty Maint. Super. • Work Week Manag. • Senior Resident 	_____	_____	_____
--	---	---	-------	-------	-------

Unplanned shutdown or load reduction of greater than 5%.	*	In addition to the notifications above: <ul style="list-style-type: none"> • Duty Engineering Manager • Work Management Director 	_____	_____	_____
--	---	--	-------	-------	-------

CUE: The JPM is complete.

Stop time	Start - Stop time is \leq 20 minutes.	_____
Evaluator calculates the time to complete the task.		_____

ote to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM LOIT06

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

- A. You are the Work Control Supervisor.
- B. The following information is provided to you:

The plant is performing a TS 3.0.3 shutdown due to INOPERABILITY of both centrifugal charging pumps (administratively INOPERABLE, both are available). The shutdown commenced at 0200 this morning. It is Saturday morning at 0210.

- C. The evaluator will act as the SM and provides cues and communications for this JPM. Do you have any questions?

Initiating Cue:

SM to WCS, **"I want to remain in an oversight role for the plant shutdown. Using the Immediate Notifications Tab in Section 3 of the Regulatory Compliance Manual (NARC) and Conduct of Operation (NAP-402, Attachment M), identify required notifications (and the time limits as applicable) as a result of the forced outage. The US or I will attend to the notifications identified in the MPEs."**

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

LOIT06



FPL Energy

Seabrook Station

JOB PERFORMANCE MEASURE LOIT07

REVIEW AND AUTHORIZE A LIQUID EFFLUENT WASTE SAMPLE REQUEST

Student Name: _____ Badge #: _____

Evaluator Name: _____ Badge #: _____

Student Signature: _____ Date: _____
(optional)

Evaluator Signature: _____ Date: _____

Training Coordinator Signature: _____ Date: _____
(optional)

SAT UNSAT

This JPM was administered for qualification: NO

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PREPARED BY: [Signature] DATE: 12/09/04
INSTRUCTOR

REVIEWED BY: NA DATE: _____
SUBJECT MATTER EXPERT (OPTIONAL)

APPROVED BY: [Signature] DATE: 12/9/04
TRAINING SUPERVISOR

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: US

0690301502 Authorize release of liquid waste.

2.0 Conditions:

- A. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
- B. WL-TK-63A `A' WTT has been filled to 18,000 gals.
- C. The `A' WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.
- D. The PSO has completed Section I of CP 4.1A, Liquid Effluent Waste Sample Request.

3.0 Standards:

Perform the verification of the completed form.
Time for completion 15 minutes.

4.0 Student Materials:

Copy of the Tear-Off Sheet
Copy of ON1018.07, WASTE TEST TANK RECIRCULATION, Rev.04,CHG 06
Copy of CP 4.1, Effluent Surveillance Program, Rev17, CHG04

5.0 Limitations on performance:

Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures

SSCP, CP 4.1, Effluent Surveillance Program.
ON1018.07, WASTE TEST TANK RECIRCULATION

Sys-Mode	KA	Description	Value RO/SRO
	2.3.10	Ability to perform procedures to reduce excessive levels of radiation and guard against personnel exposure.	2.9 / 3.3

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

7.0 **Setting:**

In-plant MCR / Simulator / Classroom

8.0 **Safety Considerations:**

PPE, as appropriate for setting

9.0 **Approximate Completion Time:**

15 minutes

10.0 **Directions to the Student:**

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to perform the verification of a completed Liquid Effluent Waste Sample Request.
- B. The following information is provided to you:
1. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
 2. WL-TK-63A 'A' WTT has been filled to 18,000 gals.
 3. The 'A' WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.
 4. The PSO has completed Section I of CP 4.1A, Liquid Effluent Waste Sample Request.
- C. The performance must meet the following standard:
1. Perform the verification of the completed form.
 2. Time for completion 15 minutes.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- D. Perform the task utilizing OS1018.07, WASTE TEST TANK RECIRCULATION and CP 4.1 Effluent Surveillance Program.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the PSO and provides cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

PSO to US, **“Unit Supervisor (or student’s name) I have completed Section One of Form CP 4.1A. Please perform the verification, using CP-4.1, ON1018.07, and the information provided”**.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

1.	P	Start time	Initiating cue read. LEWSR given to the candidate.			_____
----	---	------------	--	--	--	-------

NOTE: IF the setting is the Control Room or the Simulator, give the candidate a working copy of the procedures after he has located the required procedures, IF the setting is else where, give the candidate a working copy of the procedures after he has identified the procedures required.

NOTE: CP-4.1, "Effluent Surveillance Program" and ON1018.07, "Waste Test Tank Recirculation" procedures will be provided to the student.

*2.	P	Section I of the LEWSR is completed by Operations and provides the following information:				
		(1) Name of tank, sump, or SG Demineralizer Vessel to be sampled.	1. VERIFIES WTT A is entered.			_____

CUE: If the candidate wants to verify the amount of liquid in the WTT using the MPCS, tell him that the MPCS point C6053 indicates 18,000 gallons.

		(2) total tank or sump volume to be discharged or transferred.	2. Notes 18,000 gallons is consistent with initial conditions and indications, if checked.			_____
--	--	--	--	--	--	-------

NOTE: The recirculation rate for WTT A is actually 150 gpm. The Waste Holdup Sump (WHUS) is 400 gpm. The student must correct this mistake to ensure adequate tank recirculation prior to sampling.

CUE: IF the PSO is challenged on the recirculation rate, respond you must have been thinking about the WHUS recirc rate.

		(3) recirculation starting date, time, and rate.	*3 VERIFIES start date and time entered. CORRECTS the recirc to be 150 gpm and minimum recirc time to 240 minutes.			_____
--	--	--	--	--	--	-------

Give to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

- | | | | | | |
|---|----|--|-------|-------|-------|
| (4) sample date and time. | *4 | CORRECTS sample time to reflect longer recirc time (1130) | _____ | _____ | _____ |
| (5) the disposition of the tank. | 5. | VERIFIES <u>discharge</u> as disposition. | _____ | _____ | _____ |
| (6) the projected CW & SW pump combination for the discharge. | 6. | VERIFIES projected combination consistent with initial conditions. | _____ | _____ | _____ |

NOTE: Operator may request specific time based on manpower and scheduling.
CUE: If requested, the projected release time will be eight hours from the sample time.

- | | | | | | |
|--|----|---|-------|-------|-------|
| (7) the projected release start date and time (normally 8 hours from the sample time. | 7. | CORRECTS projected start time to be 1930. | _____ | _____ | _____ |
| (8) date, time of request, and initials of originator. | 8. | VERIFIES time, date and initials are entered. | _____ | _____ | _____ |
| (9) date, time and initials of individual that performed verification of operational data. | 9. | ENTERS his initials, date and time. | _____ | _____ | _____ |

CUE: The JPM is complete.

- | | | | | |
|---|---|-------|-------|-------|
| Stop time | Start - Stop time is \leq 15 minutes. | _____ | _____ | _____ |
| Evaluator calculates the time to complete the task. | | _____ | _____ | _____ |

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM LOIT07

WTT RECIRCULATION

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to perform the verification of a completed Liquid Effluent Waste Sample Request.
- B. The following information is provided to you:
1. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
 2. WL-TK-63A `A` WTT has been filled to 18,000 gals.
 3. The `A` WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.
 4. The PSO has completed Section I of CP 4.1A, Liquid Effluent Waste Sample Request.
- C. The evaluator will act as the PSO and provides cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

PSO to US, **“Unit Supervisor (or student’s name) I have completed Section One of Form CP 4.1A. Please perform the verification, using CP-4.1, ON1018.07, and the information provided”**.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).



FPL Energy

Seabrook Station

JOB PERFORMANCE MEASURE LOIT08

POST SCENARIO EAL DETERMINATION AND EVENT CLASSIFICATION

Student Name: _____ Badge #: _____

Evaluator Name: _____ Badge #: _____

Student Signature: _____ Date: _____
(optional)

Evaluator Signature: _____ Date: _____

Training Coordinator Signature: _____ Date: _____

SAT UNSAT

This JPM was administered for qualification: NO

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PREPARED BY: _____ DATE: _____
INSTRUCTOR

REVIEWED BY: _____ DATE: _____
SUBJECT MATTER EXPERT (OPTIONAL)

APPROVED BY: _____ DATE: _____
TRAINING SUPERVISOR

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: SRO
3450504203 Classify/reclassify an emergency condition.

2.0 Conditions:

This JPM is designed to be administered after the student has completed any simulator scenario. The intent is for the student to perform the JPM immediately after the scenario is ended while the simulator is in FREEZE. The evaluator will be required to determine the correct responses either prior to the scenario OR after the student has performed the JPM and has left the simulator room.

3.0 Standards:

Identify the applicable Emergency Action Level(s) and classify the event.

4.0 Student Materials:

Copy of the Tear-Off Sheet.

CSF status tree clipboard with the following:

- F-0.0, CSF STATUS TREE WORKSHEET, Rev. 18
- F-0.1, SUBCRITICALITY, Rev. 16
- F-0.2, CORE COOLING, Rev. 16
- F-0.3, HEAT SINK, Rev. 17
- F-0.4, INTEGRITY, Rev. 17
- F-0.5, CONTAINMENT, Rev. 16
- F-0.6, INVENTORY, Rev. 16
- F-0.7, EMERGENCY RECIRCULATION, Rev. 16
- F-0.8, RDMS, Rev. 16

ER-1.1, Classification of Emergencies, Rev. 37

5.0 Limitations on performance:

Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures

- F-0.0, CSF STATUS TREE WORKSHEET
- F-0.1, SUBCRITICALITY
- F-0.2, CORE COOLING

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- F-0.3, HEAT SINK
- F-0.4, INTEGRITY
- F-0.5, CONTAINMENT
- F-0.6, INVENTORY
- F-0.7, EMERGENCY RECIRCULATION
- F-0.8, RDMS

ER-1.1, CLASSIFICATION OF EMERGENCIES, Rev. 35

Manuals

OPMM, OP 9.2, Control Room Usage of Status Trees.

Sys	KA	Description	Value SRO
	2.4.41	Knowledge of the emergency action level thresholds and classification.	4.1

7.0 Setting:

Simulator

After the completion of any simulator scenario.

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

20 minutes

10.0 Directions to the Student:

Evaluator gives Tear-Off sheet to the student

Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

A. You are the WCS.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

B. The following information is provided to you:

Using reference material available in the control room and based on present plant conditions, determine whether any Emergency Action Level is being exceeded and whether an Emergency Classification is warranted.

C. The performance must meet the following standard:

1. Determine the status of the Critical Safety Function Status Trees then determine the Emergency Action Level and Event Classification.

D. Perform the task using the CSF clipboard and ER-1.1.

E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.

F. During the course of the walk-through examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.

G. Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.

H. I will inform you when the JPM is complete

I. We will begin after the Initiating Cue is read.

J. The evaluator will act as the SM and provide the cues and communications for this JPM. Do you have any questions?

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

11.0 Initiating Cue:

Evaluator to student, "SM to WCS (or student's name), based upon present plant conditions and using ER-1.1, Classification of Emergencies, determine whether an Emergency Classification is warranted".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss P=Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION SAT UNSAT	INITIALS/DATE
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NOTE: Due to performing this JPM without actions by an operating crew, keep the simulator in FREEZE.

1.	P	Start time	Initiating cue read.	_____
----	---	------------	----------------------	-------

NOTE: RDMS can be used whether the simulator is in RUN or FREEZE.

*2.	P	DETERMINE whether any of the critical safety functions (CSFs) are challenged.	DETERMINES CSF status by observing colors on SPDS and validating conditions for the following CSF status trees <ul style="list-style-type: none"> • Subcriticality • Core Cooling • Heat Sink • RCS Integrity • Containment Integrity Circles the letter and color of each CSF event or combination of events identified on form ER-1.1A.	_____
-----	---	---	--	-------

3.	P	Review and then circle the miscellaneous emergency conditions and combinations of miscellaneous conditions that correspond to actual station conditions:	Reviews and then circles the miscellaneous emergency conditions and combinations of miscellaneous conditions that correspond to actual station conditions on form ER-1.1A.	_____
----	---	--	--	-------

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss P=Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

4.	P	Circle any combinations of miscellaneous emergency conditions and critical safety functions that corresponds to actual station conditions.	Circles any combinations of miscellaneous emergency conditions and critical safety functions that corresponds to actual station conditions	_____	_____	_____
----	---	--	--	-------	-------	-------

CUE: It is the discretion of the SM to perform the evaluation of EAL's 12a, 12b, 12d, & 12e after initial classification is made.

*5.	P	Identify the most severe emergency classification that corresponds to the events circled	Identifies the most severe emergency classification that corresponds to the events circled	_____	_____	_____
-----	---	--	--	-------	-------	-------

CUE: "The JPM is complete."

5.		Stop time Evaluator calculates the time to complete the task.	Start - Stop time is \leq 20 minutes.	_____	_____	_____
----	--	--	---	-------	-------	-------

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR ADMIN JPM LOIT08

CSFST E-PLAN CLASSIFICATION

Directions to the Student:

Evaluator gives Tear-Off sheet to the student

Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

A. You are the WCS.

B. The following information is provided to you:

Using reference material available in the control room and based on present plant conditions, determine whether any Emergency Action Level is being exceeded and whether an Emergency Classification is warranted.

C. The evaluator will act as the SM and provide the cues and communications for this JPM. Do you have any questions?

Initiating Cue:

Evaluator to student, "**SM to WCS (or student's name), based upon present plant conditions and using ER-1.1, Classification of Emergencies, determine whether an Emergency Classification is warranted**".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: RO

0150200501 Perform A Manual QPTR Calculation

2.0 Conditions:

- A. Plant is now at 100% power after recovering from a dropped rod at EOL.
- B. The main plant computer has been inoperable since yesterday (It was inoperable when the rod dropped).
- C. The Detector Current Comparator upper section deviation alarm is lit.
- D. The seven day QPTR surveillance is scheduled to be done this shift.
- E. Incore/Excore calibration was performed yesterday (before the rod dropped).

3.0 Standards:

Perform the manual QPTR surveillance per RX1703, QPTR Surveillance.

4.0 Student Materials:

Copy of the Directions Tear-Off Sheet
Calculator
RX1703, QPTR Surveillance, Rev. 7, Chg. 1.

5.0 Limitations on performance:

Simulate/Perform all steps. Verbalize all actions to the evaluator.
Even if requested, no Peer Checks will be provided during the JPM.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

6.0 References:

Procedures

RX1703, QPTR Surveillance.
OS1000.05, Power Increase.
ON1251.01, Loss Of Plant Computer.

Sys	KA	Description	Value RO/SRO
015	A1.04	Ability to monitor changes in QPTR.	3.5/3.7
015	K5.12	Knowledge of QPTR.	3.2/3.6
015	K5.16	Definition and calculation of QPTR.	2.9/3.4
GEN	2.1.7	Ability to evaluate plant performance and make operational judgments based on operating characteristics, reactor behavior, and instrument behavior.	3.7/4.4
Gen	2.1.23	Ability to perform specific system and integrated plant procedures during all modes of operation.	3.9/4.0

7.0 Setting:

Classroom

1. Give the student a copy of 100% power NI cabinet values.
2. Examiner must prepare a completed RX1703A in advance. It shall reflect the JPM values for NI cabinet detector currents and the RE-17 100% power, 0% AFD values.
3. Use values listed in RE-17.

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

20 minutes

10.0 Directions to the Student(s):

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
2. May be asked follow-up questions to confirm knowledge of task.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- A. You are the Primary Operator. You are going to perform the QPTR surveillance.
- B. The following information is provided to you:
 - 1. Plant is now at 100% power following the recovery of a dropped rod at EOL.
 - 2. The main plant computer has been inoperable since yesterday.
 - 3. The Detector Current Comparator upper section deviation alarm is lit.
 - 4. The QPTR surveillance is scheduled to be done this shift.
 - 5. Incore/Excore calibration was performed yesterday (before the rod dropped).
- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task using RX1703, QPTR Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. I will act as the US and provide the cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

US to Primary Operator, "**Primary Operator (or student's name), perform the QPTR Surveillance in accordance with RX1703 and the data provided.**"

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

1.	P	Start time	Initiating cue read. • Obtains a copy of RX1703.	_____	_____	
----	---	------------	---	-------	-------	--

NOTE: After the correct procedure is located, give the student the copy from the JPM. When the correct form is referenced, give the student a blank form from the JPM.

CUE: When SM is informed to make an entry into action statement tracking log and database; Acknowledge the communication.

CUE: If student asks: **“The QPTR alarm surveillance has been entered and the RTS is being generated. Continue with the QPTR calculation.”**

CUE: If the student requests a Peer Check at any time during the JPM, respond: **“No one is available to peer check your actions. Please continue with the task”.**

NOTE: Provide Detector current data for upper & lower detectors.

2.	P	Refers to section 4.1, Surveillance With QPTR Alarm Inoperable:				
		a. RECORD the current output from the top (A) and bottom (B) detector of each channel on Form A, Quadrant Power Tilt Calculation Sheet.	a. Records detectors' output in row 1 of Form A (records values in microamps):			
			• N41 top detector	_____	_____	
			• N42 top detector	_____	_____	
			• N43 top detector	_____	_____	
			• N44 top detector	_____	_____	
			• N41 bottom detector	_____	_____	
			• N42 bottom detector	_____	_____	
			• N43 bottom detector	_____	_____	
			• N44 bottom detector	_____	_____	

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

NOTE: Provide the student with a copy of RE-17 if asked.

3.	P	Using data from Technical Data Book Figure RE-17, RECORD the 100% power, 0% AFD detector current, for the top (A) and bottom (B) detector of each channel on Form A, Quadrant Power Tilt Calculation Sheet.	From TDB fig RE-17, Records 100% power, 0% AFD values in Row 2: <ul style="list-style-type: none"> • 4 Top Detectors • 4 Bottom Detectors 	_____	_____	
4.	P	CALCULATE the normalized detector current by dividing each detector current by its 100% power, 0% AFD current. RECORD the results on Form A, Quadrant Power Tilt Calculation Sheet.	Calculates and records Normalized Detector Currents in Row 3: <ul style="list-style-type: none"> • 4 Top Detectors • 4 Bottom Detectors 	_____	_____	
5.	P	CALCULATE the average normalized detector current for the top detectors and for the bottom detectors. RECORD the results on Form A, Quadrant Power Tilt Calculation Sheet.	Calculates and records average normalized detector currents in Row 4: <ul style="list-style-type: none"> • Top • Bottom 	_____	_____	
6.	P	CALCULATE the Quadrant Power Tilt Ratio for each detector by dividing each normalized detector current by its associated average normalized detector current. COMPLETE Form A, Quadrant Power Tilt Calculation Sheet.	Calculates and records QPTR for each detector in Row 5: <ul style="list-style-type: none"> • 4 Top • 4 Bottom 	_____	_____	

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION SAT UNSAT	INITIALS/DATE
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NOTE: If the student expresses a rounded off value, then that value shall be compared against the standard. The only value that is "critical" is the out of tolerance (asterisked) QPTR value.

CUE: If the student inquires about the RTS provide the following cue: **"The RTS is being printed out, please circle the maximum power tilt ratio on your calculation sheet, and continue with the procedure"**.

*7.	P	RECORD the maximum power tilt ratio on applicable RTS.	* Identifies (circles) the maximum power tilt ratio consistent with the answer key.	_____	_____
-----	---	--	---	-------	-------

CUE: If the student does not report TS compliance/non-compliance, provide the cue: **"Is QPTR within Tech. Spec. Limits?"**

9.	P	If the Quadrant Power Tilt Ratio is determined to be greater than 1.02, immediately NOTIFY the SS/US.	* Determines and reports that QPTR is outside TS limits.	_____	_____
----	---	---	--	-------	-------

CUE: **"The JPM is complete."**

9.		Stop time Evaluator calculates the time to complete the task.	Start - Stop time is ≤ 20 minutes.		
----	--	--	------------------------------------	--	--

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0027J

Directions to the Student:

Evaluator gives Tear-Off sheet to the student

Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are the Primary Operator. You are going to perform the QPTR surveillance.
- B. The following information is provided to you:
1. Plant is now at 100% power following the recovery of a dropped rod at EOL.
 2. The main plant computer has been inoperable since yesterday.
 3. The Detector Current Comparator upper section deviation alarm is lit.
 4. The QPTR surveillance is scheduled to be done this shift.
 5. Incore/Excore calibration was performed yesterday.
- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task using RX1703, QPTR Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the US and provide the cues and communications for this JPM. Do you have any questions?

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0027J

Initiating Cue:

US to Primary Operator, "Primary Operator (or student's name), perform the QPTR Surveillance in accordance with RX1703 and the data provided."

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

L0027J

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: RO

0010100401 Perform Shutdown Margin Calculations

2.0 Conditions:

- A. The plant is in Mode 1, EOL at 100% RTP, 300 ppm boron and stable.
- B. During performance of OX1410.02, Quarterly Rod Op Surveillance, rod H-2 dropped to the bottom of the core.
- C. Rod H-2 cannot be moved.
- D. The Dropped Rod abnormal, OS1210.05 actions are being performed.

3.0 Standards:

Determine the shutdown margin within ± 150 pcm.

4.0 Student Materials:

Copy of the Tear-Off Sheet.
RX1707, Shutdown Margin Surveillance, Rev. 7 Chg. 04.
Primary Technical Data Book curves RE-8 Rev. 10-10-03, RE-18 Rev. 01-10-01, and RE-19 Rev. 10-13-03.

5.0 Limitations on performance:

Simulate/Perform all steps. Verbalize all actions to the evaluator.
Even if requested, no Peer Checks will be provided during the JPM.

6.0 References:

- RX1707, Shutdown Margin Surveillance.

Sys	KA	Description	Value RO/SRO
001000	K5.08	Reason for rod insertion limits & effect on SDM.	3.9/4.4
APE 005	AK1.05	Calculation of minimum shutdown margin.	3.3/4.1
GEN	2.1.7	Ability to evaluate plant performance and make operational judgments based on operating characteristics, reactor behavior, and instrument interpretation.	3.7/4.4
GEN	2.1.25	Ability to obtain and interpret station reference materials such as graphs, monographs, and tables which contain performance data.	2.8/3.1

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

7.0 Setting:

Simulator, Control Room or Classroom

1. Simulator setup requires event to be actuated and frozen as a static scenario.
Alternatively, the calculation may be performed outside the simulator.
2. Because simulator core cycle may lag core cycle in the plant and appropriate Primary TDB figures will vary, the instructor must prepare an answer key prior to performance of this JPM for the selected setting.
3. Simulator setup as follows:
 - a. Initialize to a 100% RTP IC.
 - b. Enter malfunction {**IMF CP010** Dropped Rod: RCCA H-2}.
 - c. Stabilize the plant at 100% RTP
 - 1) Place Rods in Manual
 - 2) Decrease turbine load & match T_{AVG}/T_{REF}
 - 3) Reset C-7 if necessary

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

15 minutes

10.0 Directions to the Student(s):

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to calculate Shutdown Margin in Mode 1.
- B. The following information is provided to you:
1. The plant is in Mode 1, at 100% RTP, EOL, 300 ppm boron and stable. Core burnup is 18,000 MWD/MTU.
 2. During performance of OX1410.02, Quarterly Rod Operability Surveillance, rod H-2 dropped to the bottom of the core.
 3. Rod H-2 cannot be moved up or down.
 4. The Dropped Rod abnormal, OS1210.05 actions are being performed.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task using RX1707, Shutdown Margin Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. I will act as the US and provide the cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

US to student (or student's name), **"Based on given plant conditions, CALCULATE the Shutdown Margin per RX1707."**

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION SAT UNSAT	INITIALS/DATE
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NOTE: Provide RE procedure RX1707 & curves RE-8, RE-18, and RE-19 upon the students request.

1. P Start time Initiating cue read.

CUE: If the student requests a Peer Check at any time during the JPM, respond: **“No one is available to peer check your actions. Please continue with the task”.**

2. P Refer to section 4.4 of RX1707, Shutdown Margin Verification With Inoperable Rod(s) - Immovable, Untrippable Or Dropped. Refers to section 4.4 of RX1707.

*3. P Shutdown Margin Verification with inoperable rod(s) in MODEs 1 and 2 is accomplished by completing Part I of Form C, Shutdown Margin Determination - Immovable, Untrippable or Dropped Rod(s).

a. Determine number of Immovable, Untrippable and Dropped Rod(s)	a. Records number of dropped rods on Part 1 of Form C (value a = 1).	_____	_____
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b. Determine maximum Worth Individual of Immovable, Untrippable or Dropped Rod (Primary Technical Data Book Figure RE-18)	b. Obtains / records RE-18 value for dropped rod. (value b = RE-18 value for dropped rod.)	_____	_____
---	--	-------	-------

c. Determine Total Unavailable Rod Worth	c. Calculates Unavailable Rod Worth (value c). (value a) × (value b) = (value c).	_____	_____
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CUE: If student request boron concentration, reply **“RCS boron concentration is 300 ppm.”**

d. Determine Total Power Defect - For Current Relative Power (Primary Technical	d. Obtains/records Total Power Defect for current power (value d).	_____	_____
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

Data Book Figure RE-8).

e. Determines worth of the Control Banks Inserted to the Rod Insertion Limit - For Current Relative Power (Primary Technical Data Book Figure RE-19).	e. Obtains/records current power worth of control banks inserted to RIL (value e).	_____	_____	_____
---	--	-------	-------	-------

f. Determines Total Control and Shutdown Rod Worth Minus Stuck Rod and less 10% uncertainty (Primary Technical Data Book Figure RE-18).	f. Obtains/records Total Control & SD Rod Worth Minus Stuck Rod from RE-18 (value f).	_____	_____	_____
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g. Determines Shutdown Margin [f - (c + d + e)] / 1,000	*g. Calculates SDM within ± 0.15 %ΔK/K of answer key.	_____	_____	_____
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UE: "The JPM is complete."

4.	Stop time Evaluator calculates the time to complete the task.	Time to complete the task ≤ 15 minutes.
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0043J

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to calculate Shutdown Margin in Mode 1.
- B. The following information is provided to you:
1. The plant is in Mode 1, at 100% RTP, 300 ppm boron and stable. Core burnup is 18,000 MWD/MTU.
 2. During performance of OX1410.02, Quarterly Rod Operability Surveillance, rod H-2 dropped to the bottom of the core.
 3. Rod H-2 cannot be moved up or down.
 4. The Dropped Rod abnormal, OS1210.05 actions are being performed.
- C. You may request a Peer Check of your actions while performing the task.
- D. Perform the task as per RX1707, Shutdown Margin Surveillance.
- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. (Statement optional for multiple JPMs)
During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. (Statement optional for multiple JPMs)
Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the US and provide the cues and communications for this JPM. Do you have any questions?

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0043J

Initiating Cue:

US to student (or student's name), "Based on given plant conditions, CALCULATE the Shutdown Margin per RX1707."

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

L0043J

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: RO

0620200601 Coordinate AC Power Sources Weekly Operational Check.

2.0 Conditions:

- A. The plant is in MODE 1 (2, 3 or 4)
- B. The RCS is 557°F and 2235 psig.
- C. The 'A' EDG is out of service due to a failed surveillance.

3.0 Standards:

Perform the AC Power Source Weekly Surveillance MODES 1 through 4 OX1446.01 to ensure operability of offsite sources.

4.0 Student Materials:

- A. Copy of the Tear-Off Sheet
- B. Access to The MPCS
- C. Copy of OX1446.01, Rev 8, Chg 8, "AC Power Source Weekly Surveillance"

5.0 Limitations on performance:

Simulate/Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures

OX1446.01 AC Power Source Weekly Surveillance

Sys-Mode	KA	Description	Value RO/SRO
062	A4.01	Ability to operate and monitor all breakers	3.3-3.1

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

7.0 Setting:

Simulator

1. This JPM can be performed on any MODE 4 or higher IC.
2. Place the simulator in RUN.
3. **Insert mfED031 (DG-1A Auto Start Failure)**
4. **Override DG-1A Emergency Stop Pushbuttons**
5. **Place "A" EDG Output Breaker to PTL and rackout breaker**
6. **Hang Danger tag on output breaker.**
7. **Note that IC#217 has been snapped with these commands such that other JPM's may be performed simultaneously.**

8.0 Safety Considerations:

None

9.0 Approximate Completion Time:

10 minutes

10.0 Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are the Secondary Operator. You are going to perform OX1446.01 AC Power Source Weekly Surveillance MODES 1 through 4 to ensure operability of offsite sources
- B. The following information is provided to you:
1. The plant is in MODE 1 (2, 3 or 4).
 2. The RCS is 557°F and 2235 psig.
 3. The 'A' EDG is out of service due to a failed surveillance.
- C. The performance must meet the following standard:
1. Determine the operability of offsite sources per AC Power Source Weekly Surveillance
- D. Perform the task using OX1446.01 AC Power Source Weekly Surveillance

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of this task.
- F. During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete.
- I. We will begin after the "Initiating Cue" is read.
- J. I am the US in the control room. I will provide the cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

US to Primary Operator, "**Secondary Operator**, (or student's name) **using the provided OX1446.01, determine the operability of the Offsite AC Power Sources for Bus 5UAT/Bus 6RAT (Form A)**".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

1.	P	Start time	Initiating cue read.			_____
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NOTE: Provide the student a copy of OX1446.01.

2.	P	After obtaining a copy of OX1446.01, reviews precautions and prerequisites.	Determines there are no prerequisites and precaution is N/A.			
----	---	---	--	--	--	--

CUE: If dispatcher is asked for line status, inform the student that “the line is connected”.

Performs Step 4.1.1.1

3.	P	Completes Form A as directed by initial cue for Bus 5UAT.	<ul style="list-style-type: none"> Verifies the availability of offsite power from the Bus 5 UAT Breaker to one offsite source by referring to applicable MCB indications. (All three possibilities are listed, only one is required) Checks appropriate blocks on Form A as noted per key. Records appropriate line MW. 			_____ _____ _____
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Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

Performs Step 4.1.1.2

4.	P	Completes Form A as directed by initial cue for Bus 6RAT.	<ul style="list-style-type: none"> Verifies the availability of offsite power from the Bus 6 RAT Breaker to a different offsite source by referring to applicable MCB indications. (All four possibilities are listed, only one is required) 	_____	_____
			<ul style="list-style-type: none"> Checks appropriate blocks on Form A as noted per key. 	_____	_____
			<ul style="list-style-type: none"> Records appropriate line MW. 	_____	_____

CUE: When at step 4.1.2, inform the student it is NOT desired to use Figure 1.

Step 4.1.3

*5.	P	Determine number of operable offsite sources and record on Table 1.	*Student should note that 2 sources are available and note on Table 1.	_____	_____
		CUE: "The JPM is complete."			
		Stop time: _____	Time to complete the task ≤ 10 minutes.		
		Evaluator calculates the time to complete task.		_____	_____

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

Performs Step 4.1.1.2

4.	P	Completes Form A as directed by initial cue for Bus 6RAT.	<ul style="list-style-type: none"> Verifies the availability of offsite power from the Bus 6 RAT Breaker to a different offsite source by referring to applicable MCB indications. (All four possibilities are listed, only one is required) Checks appropriate blocks on Form A as noted per key. Records appropriate line MW. 	_____	_____	_____
----	---	---	--	-------	-------	-------

CUE: When at step 4.1.2, inform the student it is NOT desired to use Figure 1.

Step 4.1.3

*5.	P	Determine number of operable offsite sources and record on Table 1.	*Student should note that 2 sources are available and note on Table 1.	_____	_____	_____
		CUE: "The JPM is complete."				
		Stop time: _____	Time to complete the task ≤ 10 minutes.			
		Evaluator calculates the time to complete task.				

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM L0002i

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are the Secondary Operator. You are going to perform OX1446.01 AC Power Source Weekly Surveillance MODES 1 through 4 to ensure operability of offsite sources
- B. The following information is provided to you:
1. The plant is in MODE 1 (2, 3 or 4).
 2. The RCS is 557°F and 2235 psig.
 3. The 'A' EDG is out of service due to a failed surveillance.
- C. I am the US in the control room. I will provide the cues and communications for this JPM. Do you have any questions?

12.0 Initiating Cue:

US to Primary Operator, "**Secondary Operator**, (or student's name) **using the provided OX1446.01, determine the operability of the Offsite AC Power Sources**", **for Bus 5UAT/Bus 6RAT (Form A)**".

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).



FPL ENERGY SERVICES

Seabrook Station

JOB PERFORMANCE MEASURE LOIT04

INITIATE A LIQUID EFFLUENT WASTE SAMPLE REQUEST

Student Name: _____ Badge #: _____

Evaluator Name: _____ Badge #: _____

Student Signature: _____ Date: _____
(optional)

Evaluator Signature: _____ Date: _____

Training Coordinator Signature: _____ Date: _____
(optional)

SAT UNSAT

This JPM was administered for qualification: NO

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PREPARED BY: _____ DATE: 12/9/04
INSTRUCTOR

REVIEWED BY: _____ DATE: _____
SUBJECT MATTER EXPERT (OPTIONAL)

APPROVED BY: _____ DATE: 12/9/04
TRAINING SUPERVISOR

JOB PERFORMANCE WORKSHEET

1.0 Task Number and Description:

Position: RO

1190153001 Initiate a release of liquid waste.

2.0 Conditions:

- A. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
- B. WL-TK-63A 'A' WTT has been filled to 18,000 gals.
- C. The 'A' WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.

3.0 Standards:

Using the information provided, initiate a Liquid Effluent Waste Sample Request using CP-4.1, "Effluent Surveillance Program".

4.0 Student Materials:

Copy of the Tear-Off Sheet
Copy of ON1018.07, WASTE TEST TANK RECIRCULATION, Rev.04,CHG 06
Copy of CP 4.1, Effluent Surveillance Program, Rev17, CHG04

5.0 Limitations on performance:

Perform all steps. Verbalize all actions to the evaluator.

6.0 References:

Procedures

SSCP, CP 4.1, Effluent Surveillance Program.
ON1018.07, WASTE TEST TANK RECIRCULATION

Sys-Mode	KA	Description	Value RO/SRO
	2.3.10	Ability to perform procedures to reduce excessive levels of radiation and guard against personnel exposure.	2.9 / 3.3

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

7.0 Setting:

In-plant MCR / Simulator / Classroom

8.0 Safety Considerations:

PPE, as appropriate for setting

9.0 Approximate Completion Time:

15 minutes

10.0 Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to perform initiation of a Liquid Effluent Waste Sample Request, using the information provided.
- B. The following information is provided to you:
1. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
 2. WL-TK-63A 'A' WTT has been filled to 18,000 gals.
 3. The 'A' WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.
- C. The performance must meet the following standard:
1. Perform the verification of the completed form.
 2. Time for completion 15 minutes.
- D. Perform the task utilizing OS1018.07, WASTE TEST TANK RECIRCULATION and CP 4.1 Effluent Surveillance Program.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

JOB PERFORMANCE WORKSHEET

- E. To perform the task successfully, you must perform/simulate all critical steps correctly and verbalize all your actions to the evaluator. Practicing STAR techniques and using the station communication standard will safeguard successful completion of the task.
- F. During the course of the walkthrough examination, there may be some tasks you will be asked to perform that may require you to implement an alternative method directed by plant procedures in order to complete the assigned task. You are expected to make decisions and take actions based on the facility's procedural guidance and the indications available.
- G. Failure to perform or simulate a critical element within the prescribed standard will result in a failure of the task.
- H. I will inform you when the JPM is complete
- I. We will begin after the Initiating Cue is read.
- J. The evaluator will act as the PSO and provides cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

US to RO, " **Reactor Operator (or student's name) using the information provided, initiate a Liquid Effluent Waste Sample Request in accordance with CP-4.1A. Provide completed request to the US upon completion for review.**

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

	D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
				SAT	UNSAT	

1.	P	Start time	Initiating cue read and information provided.			_____
----	---	------------	---	--	--	-------

NOTE: It is assumed that the candidate will use CP 4.1 to process through the verification and check ON1018.07 to verify the tank volume and recirculation flow rate. The candidate may choose to verify the tank volume and recirculation rate prior to referring to CP 4.1. These steps can be performed in any order as long as all steps are completed correctly.

2.	P	Obtains required procedures.	Obtains CP-4.1, CP-4.1A, and ON1018.07.			_____
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*3.	P	Completes Section 1 of CP-4.1A with all of the following attributes:				
		(1) Enters name of tank to be sampled.	*1. ENTERS WTT A or WL-TK-63A.			_____

CUE: If the candidate wants to verify the amount of liquid in the WTT using the MPCS, tell him that the MPCS point indicates 18,000 gallons.

		(2) Enters total tank or sump volume to be discharged or transferred.	*2. ENTERS 18,000 gallons which is consistent with initial conditions provided and indications, if checked.			_____
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		(3) Enters recirculation rate.	*3. ENTERS 150 gpm in the recirculation rate block.			_____
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		(4) Calculates and enters minimum recirculation time.	*4. CALCULATES and ENTERS 240 minutes in the minimum recirculation time block.			_____
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		(5) Enters the disposition of the tank.	5. CHECKS <u>discharge</u> as disposition.			_____
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.ote to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

PERFORMANCE CHECKLIST

D=Discuss =Perform S=Simulate	ELEMENT/STEP *denotes a critical step	STANDARD *denotes critical standard	EVALUATION		INITIALS/DATE
			SAT	UNSAT	

(6) Enters Recirculation Start Date & Time	*6. ENTERS todays date and whatever time is appropriate.	_____	_____	_____
(7) Enters Sample Date and Time	*7. ENTERS todays date and time (+240 minutes from recirc start time)	_____	_____	_____
(8) Enters the projected CW & SW pump combination for the discharge (provided)	*8. ENTERS 2 CW pumps and 2 SW pumps consistent with initial conditions.	_____	_____	_____

NOTE: Operator may request specific time based on manpower and scheduling.
CUE: If requested, the projected release time will be eight hours from the sample time.

(9) Enters the projected release start date and time (normally 8 hours from the sample time).	9. ENTERS the projected release start date (todays date) and time (+ 8 hours from sample time)	_____	_____	_____
(10) Enters date, time of request, and initials of originator.	10. ENTERS time, date and initials in the Originator block.	_____	_____	_____
(11) Provides completed LEWSR to the US	11. PROVIDES completed section 1 of LEWSR to the US for review.	_____	_____	_____

CUE: The JPM is complete.

Stop time	Start - Stop time is \leq 15 minutes.	_____	_____	_____
Evaluator calculates the time to complete the task.				

ote to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).

TEAR-OFF SHEET FOR JPM LOIT04

Directions to the Student:

Evaluator gives Tear-Off sheet to the student
Evaluator reads the following to the student (Optional for multiple JPMs)

Student:

1. Ensures task is done correctly.
 2. May be asked follow-up questions to confirm knowledge of task.
- A. You are going to perform initiation of a Liquid Effluent Waste Sample Request, using the information provided.
- B. The following information is provided to you:
1. The plant is in MODE 1 with two Service Water and two Circulating Water pumps running with no expected change in configuration.
 2. WL-TK-63A 'A' WTT has been filled to 18,000 gals.
 3. The 'A' WTT has to be sampled to prepare a LEW permit for a release to the Transition Structure.
- C. The evaluator will act as the PSO and provides cues and communications for this JPM. Do you have any questions?

11.0 Initiating Cue:

US to RO, " Reactor Operator (or student's name) using the information provided, initiate a Liquid Effluent Waste Sample Request in accordance with CP-4.1A. Provide completed request to the US upon completion for review.

Note to Evaluator - Obtain Tear-Off Sheets from student following JPM completion (Ops only).