

Farley Exam Review comments FA2015-301

#79 – Question is attached.

<u>Student</u>	<u>Docket #</u>
XXXXXXXXXX	55-XXXXXX
XXXXXXXXXX	55-XXXXXX
XXXXXXXXXX	55-XXXXXX

A and C could be correct. Damage to main steam lines and Safeties due to SG overflow is not specifically called out in the BASES summary for P-4, but P-4 is mentioned as performing a seal in function for P-14 in the BASES for P-14. The P-14 BASES summary does talk about damage to main steam lines and Safeties due to SG overflow.

The Facility disagrees. P-4 seals in P-14 to prevent inadvertent addition of feed water to a faulted SG to prevent excessive cooldown and excessive Containment Pressure, which supports the P-4 BASES. P-4 BASES has no discussion of P-4 being OPERABLE to prevent damage to main steam lines and Safeties due to SG overflow. P-4 is not required to be OPERABLE for P-14 to perform its function.

#92 – Question is attached.

<u>Student</u>	<u>Docket #</u>
XXXXXXXXXX	55-XXXXXX
XXXXXXXXXX	55-XXXXXX
XXXXXXXXXX	55-XXXXXX

Students stated that there is no correct answer since all conditions for signing off the Work Document Holder are not met. No one can sign off the Work Document Holder based on the conditions in the stem.

The Facility agrees. The question appears faulted based on the student feedback. See the attached request for an Exam Key Change.

KEY

79.007EA2.03 079

Unit 1 is in MODE 3 with the following conditions:

At 1000:

- The Shutdown Banks are withdrawn.

At 1005:

- A complete loss of offsite power occurs.

Which one of the following completes the statements below?

At 1005, manual action (1) required to generate a P-4 signal.

Per the BASES of Tech Spec 3.3.2, ESFAS Instrumentation, P-4 is required to be OPERABLE to prevent (2).

A. ✓ (1) IS

(2) excessive Containment pressure due to a steamline break

B. (1) is NOT

(2) excessive Containment pressure due to a steamline break

C. (1) IS

(2) damage to the Main Steam lines and SG safeties due to SG overfill

D. (1) is NOT

(2) damage to the Main Steam lines and SG safeties due to SG overfill

KEY

- Under the above conditions, there are NO Reactor trip signals. FSD-181007 is provided in references.

LCO 3.3.2 BASES

Each of the above Functions is interlocked with P-4 to avert or reduce the continued cooldown of the RCS following a reactor trip. An excessive cooldown of the RCS following a reactor trip could cause an insertion of positive reactivity with a subsequent increase in generated power. **Addition of feedwater to a steam generator associated with a steamline or feedline break could result in excessive containment building pressure.**

Distracter analysis:

- A. Correct. 1. Correct. There are no automatic Reactor trip signals in the above scenario.
2. Correct. Per LCO 3.3.2 bases.
- B. Incorrect. 1. Incorrect. See A.1. Plausible since this would be the correct answer for different plant conditions. There are a 3 trips that would occur at higher power levels: >10% - RCS low flow, RCP UV and UF under these conditions..
2. Correct. See A.2.
- C. Incorrect. 1. Correct. See A.1.
2. Incorrect. See A.2. Plausible since P-4 causes a Feedwater Isolation coincidence with Low Tavg. Also, P-4 prevents the FW isolation from being reset on an SI or SG Level HI-HI. The applicant could reason that this is to prevent SG overfill. This is the BASES for P-14
- D. Incorrect. 1. Incorrect. See B.1.
2. Incorrect. See C.2.

K/A:

007EA2.03 - Reactor Trip - Ability to determine or interpret the following as they apply to a reactor trip: Reactor trip breaker position.

Importance Rating:

4.2 / 4.4

Technical Reference:

FSD A181007, Reactor Protection System, v20
TECH SPECS BASES, v67

KEY

References provided:

None

Learning Objective:

RECALL AND APPLY the information from the LCO BASES sections: BACKGROUND, APPLICABLE SAFETY ANALYSIS, ACTIONS, SURVEILLANCE REQUIREMENTS, for any Technical Specifications or TRM requirements associated with Reactor Protection System (RPS), and attendant equipment, to include the following: (OPS-62201I01): 10CFR55.43 (b) 2

[...]

3.3.2 Engineered Safety Feature Actuation System (ESFAS) Instrumentation

Question History:

MOD ESP-0.1-62531B01-4

Basis for meeting K/A:

Applicant must be able to determine the status of P-4 (Reactor Trip Breakers) and interpret the reason for having the P-4 signal.

SRO justification:

Can question be answered solely by knowing ≤ 1 hour TS/TRM Action? NO

Can question be answered solely by knowing the LCO/TRM information listed "above-the-line?" NO

Can question be answered solely by knowing the TS Safety Limits? NO

Does the question involve one or more of the following for TS, TRM, or ODCM?

- Knowledge of TS bases that is required to analyze TS required actions and terminology. YES

Applicant must have knowledge of LCO 3.3.2 Bases to answer this question.

KEY

92. G2.2.13 092

A tagout is required to be cleared during night shift and the Work Document Holder is **not** on site and **cannot** be contacted to gain their approval.

Per NMP-AD-003, Equipment Clearance and Tagging, which one of the following can **sign off** the Work Document Holder?

- A. ✓ Shift Manager
- B. Operations Director
- C. Maintenance Director
- D. Maintenance Manager

NMP-AD-003

4.17 ALTERNATE RELEASE AUTHORIZATION

1. In the event that release is required and a Work Document Holder is NOT on site and CANNOT be contacted, **the release can be authorized by the Shift Manager under the following conditions:**

- **The Work Document Holder is NOT on Site.**
 - **The Work Document Holder CANNOT be contacted.**
 - A knowledgeable individual (department supervisor) has conducted a check of the job and determined the release will not be detrimental to the plant or personnel.
2. The Shift Manager will **sign off** the Work Document Holder.
3. The Shift Manager will **designate** an individual to remove any personal locking devices and tags for components affected by the Tagout release.

Distracter analysis:

- A. Correct. Per NMP-AD-003 Step 4.17.
- B. Incorrect. See A. Plausible due the potential significance to equipment or personnel if an error occurs.
- C. Incorrect. See A. Plausible due the potential significance to equipment or personnel if an error occurs and the work document holder is usually a maintenance worker.
- D. Incorrect. See A. Plausible since the work document holder is usually a maintenance worker.

KEY

K/A:

G2.2.13 - Knowledge of tagging and clearance procedures.

Importance Rating:

4.1 / 4.3

Technical Reference:

NMP-AD-003, Equipment Clearance and Tagging, v18.3

References provided:

None

Learning Objective:

Given NMP-AD-003, "Equipment Clearance and Tagging", STATE the responsibilities of the following positions: (S-GE-400.030.A.03)

[...]

- Shift Manager

[...]

Question History:

NEW

Basis for meeting K/A:

Requires the applicant to have knowledge of SRO responsibilities in regard to tagging and clearance procedures.

SRO justification:

This decision is made by the Shift Manager and is the job of an SRO.

Farley Nuclear Plant ILT 38 Exam Question 92

Recommendation:

Request an Exam Key Change to remove Question 92 from the exam due to no correct answer available.

JUSTIFICATION

The exam team developed and validated this question with the intent that the question ask “which individual has the authority to sign off a Work Document Holder from a tagout when he is offsite and unavailable”. Based on validator feedback and efforts to clarify the question this was the final product:

A tagout is required to be cleared during night shift and the Work Document Holder is not on site and cannot be contacted to gain their approval.

Per NMP-AD-003, Equipment Clearance and Tagging, which one of the following can sign off the Work Document Holder?

- A. Shift Manager**
- B. Operations Director**
- C. Maintenance Director**
- D. Maintenance Manager**

Answer choice A, the Shift Manager is selected as the correct answer.

During post exam feedback, some students stated that based on the question asked, there is no correct answer. Since all the requirements of NMP-AD-003 were not met, no one could sign off the Work Document Holder. NMP-AD-003 has 3 requirements for the Shift Manager to be able to sign off the Work Document Holder, and only 2 of the requirements were listed in the stem. It was not stated in the stem that “A knowledgeable individual (department supervisor) has conducted a check of the job and determined the release will not be detrimental to the plant or personnel.” This “knowledgeable individual” would normally be someone from the maintenance department who had in depth knowledge of the work in progress that required the tagout. The Maintenance Director answer choice was chosen once, and the Maintenance Manager was chosen once.

Although the intent of the question was to ask “which individual has the authority to sign off a Work Document Holder from a tagout when he is offsite and unavailable”, the question is asking “which one of the following can sign off the Work Document Holder”. For the conditions given, no one can sign off the Work Document Holder since all the requirements are not met.

NUREG-1021, Appendix B page 4 of 26, c. states: State the question unambiguously, precisely, and as concisely as possible, but provide all necessary information.

The question lacks adequate Stem Focus. All of the necessary information was not provided in the stem of the question to answer the question.

NUREG-1021, Appendix E, page 2 of 6, step 7 states: When answering a question, do not make assumptions regarding conditions that are not specified in the question unless they occur as a consequence of other conditions that are stated in the question. Similarly, you should assume that no operator actions have been taken, unless the stem of the question or the answer choices specifically state otherwise.

The third requirement of NMP-AD-003 was not stated in the stem and could not be assumed to be met, therefore no correct answer exists.

NUREG 1021, ES-403, page 3 of 6, c. states: If three or more answers could be considered correct or there is no correct answer, the question shall be deleted.

NMP-AD-003, Equipment Clearance and Tagging, states:

4.17 ALTERNATE RELEASE AUTHORIZATION

1. In the event that release is required and a Work Document Holder is NOT on site and CANNOT be contacted, the release can be authorized by the Shift Manager under the following conditions:

- The Work Document Holder is NOT on Site.
 - The Work Document Holder CANNOT be contacted.
 - A knowledgeable individual (department supervisor) has conducted a check of the job and determined the release will not be detrimental to the plant or personnel.
2. The Shift Manager will **sign off** the Work Document Holder.
 3. The Shift Manager will **designate** an individual to remove any personal locking devices and tags for components affected by the Tagout release.
 4. The department supervisor must make all reasonable attempts to contact the employee off site and take positive steps to ensure the Work Document Holder will be notified immediately upon return to the site and prior to starting work.
 5. The Alternate Release authorization is documented using the site corrective action process.