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10 CFR 50.90

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ATTN: Document Control Desk
U.S. Nuclear Regular Commission
Washington, D.C. 20555-0001

James A. FitzPatrick Nuclear Power Plant, Unit 1
Renewed Facility Operating License No. DPR-59
NRC Docket No. 50-333

Subject: Application to Adopt TSTF-372, "Addition of LCO 3.0.8, Inoperability of Snubbers"

References:
1. TSTF-372, Revision 4, "Addition of LCO 3.0.8, Inoperability of Snubbers," dated April 23, 2004
2. Notice of Availability of Model Application Concerning Technical Specification Improvement to Modify Requirements Regarding the Addition of Limiting Condition for Operation 3.0.8 on the Inoperability of Snubbers Using the Consolidated Line Item Improvement Process, dated May 4, 2005 (70 FR 23252)

In accordance with the provisions of 10 CFR 50.90 "Application for amendment of license, construction permit, or early site permit," Exelon Generation Company, LLC (Exelon) is requesting approval for proposed changes to the Technical Specifications (TS), Appendix A of Renewed Facility Operating License Nos. DPR-59 for James A. FitzPatrick Nuclear Power Plant (JAF), Unit 1.

The proposed amendments would modify the TS requirements for inoperable dynamic restraints (snubbers) by adding a new Limiting Condition for Operation (LCO) 3.0.8. The change is consistent with the Nuclear Regulatory Commission (NRC) approved Revision 4 to Technical Specification Task Force (TSTF) Standard Technical Specification Change Traveler, TSTF-372, "Addition of LCO 3.0.8, Inoperability of Snubbers," (Reference 1). The availability of this TS improvement was announced in the *Federal Register* on May 4, 2005 (70 FR 23252), as part of the consolidated line item improvement process (Reference 2).

The proposed changes have been reviewed and recommended for approval by the Plant Operations Review Committee in accordance with the Exelon Quality Assurance Program.

Attachment 1 provides a description of the proposed changes, the requested confirmation of applicability, assessment, regulatory analysis, and environmental consideration of the proposed changes. Attachment 2 provides the existing TS pages marked up to show the proposed changes. Attachment 3 provides the existing TS Bases pages marked up to show the proposed changes (for information only).

Exelon requests approval of the proposed License Amendment by July 1, 2020, with the amendment being implemented no later than August 31, 2020.

In accordance with 10 CFR 50.91, "Notice for public comment; State consultation," paragraph (b), Exelon is transmitting a copy of this letter and its attachments to the designated State Official.

If you should have any questions regarding this submittal, please contact Christian Williams at 610-765-5729.

I declare under penalty of perjury that the foregoing is true and correct. Executed on the 26th day of September 2019.

Respectfully,

David T. Gudger

David T. Gudger
Acting Director - Licensing and Regulatory Affairs
Exelon Generation Company, LLC

Attachments:
1. Description and Assessment
2. Proposed Technical Specifications Changes (Mark-Ups)
3. Proposed Technical Specifications Bases Changes (Mark-Ups) (For Information Only)

cc:	USNRC Region I, Regional Administrator	w/ attachments
	USNRC Project Manager, JAF	"
	USNRC Senior Resident Inspector, JAF	"
	A.L Peterson, NYSEDRA	"

ATTACHMENT 1

License Amendment Request

James A. FitzPatrick Nuclear Power Plant, Unit 1
Docket No. 50-333

Application to Adopt TSTF-372,
"Addition of LCO 3.0.8, Inoperability of Snubbers"

Description and Assessment

1.0 DESCRIPTION

The proposed amendment would modify Technical Specifications (TS) requirements for inoperable snubbers by adding a new Limiting Condition for Operation (LCO) 3.0.8.

The changes are consistent with Nuclear Regulatory Commission (NRC) approved Industry/Technical Specification Task Force (TSTF) STS change TSTF-372, "Addition of LCO 3.0.8, Inoperability of Snubbers," Revision 4. The availability of this TS improvement was published in the *Federal Register* on May 4, 2005, as part of the consolidated line item improvement process (CLIIP).

2.0 ASSESSMENT

2.1 Applicability of Published Safety Evaluation

Exelon Generation Company, LLC (Exelon) has reviewed the Model Safety Evaluation (SE) dated May 4, 2005, as part of the CLIIP. This review included a review of the NRC's evaluation, as well as the supporting information provided to support TSTF-372. Exelon has concluded that the justifications presented in the TSTF proposal and the safety evaluation prepared by the NRC are applicable to James A. FitzPatrick Nuclear Power Plant (JAF), Unit 1 and justify this amendment for the incorporation of the changes into the JAF, Unit 1 TS.

2.2 Optional Changes and Variations

Exelon is proposing the following variations from the TS changes described in the TSTF-372 Revision 4 and the NRC's model safety evaluation dated May 4, 2005:

2.2.1 Exelon proposes the following variations from the TS changes described in the TSTF-372, Revision 4:

- The model application provided in the Notice of Availability for TSTF-372 published in the Federal Register on May 4, 2005, includes an attachment for typed, camera-ready (revised) TS pages reflecting the proposed changes. JAF is not including such an attachment due to the straightforward nature of the proposed changes. Providing only mark-ups of the proposed TS changes satisfies the requirements of 10 CFR 50.90, "Application for amendment of license, construction permit, or early site permit," in that the mark-ups fully describe the changes desired. This is an administrative deviation from TSTF-372 with no impact on the NRC's model safety evaluation dated May 4, 2005. Because of this deviation, the contents and numbering of the attachments for this amendment request differ from the attachments specified in the model application.

2.2.2 Exelon proposes the following minor variations from the TS Bases changes described in the TSTF-372, Revision 4:

- The Model SE, Section 3.1.2 provided in the Notice of Availability published in the Federal Register on May 4, 2005, contains restrictions, applicable to Boiling Water Reactor (BWR) plants, to prevent potentially high-risk configurations. The specific

configuration restrictions identified in the Model SE are being added to the proposed TS Bases for LCO 3.0.8.

- The Model SE, Section 3.2, Item 1(e) provided in the Notice of Availability published in the Federal Register on May 4, 2005, contains the statement "LCO 3.0.8 does not apply to non-seismic snubbers." This does not appear to be captured in the implementation process of the approved TSTF-372, Revision 4. Therefore, Exelon proposes to include this statement in the LCO 3.0.8 Bases (i.e., Attachment 3, Insert 2). Further guidance associated with the intent of this statement, as discussed in Section 3.0 of the Model SE and in TSTF-IG-05-03, "Implementation Guidance for TSTF-372, Revision 4, 'Addition of LCO 3.0.8, Inoperability of Snubbers,'" is also included in the proposed TS Bases insert for LCO 3.0.8.

These variations are insignificant relative to ensuring the proper application of the intent of TSTF-372, Revision 4.

3.0 REGULATORY ANALYSIS

3.1 No Significant Hazards Consideration Determination

Exelon Generation Company, LLC (Exelon) has evaluated whether or not a significant hazards consideration is involved with the proposed amendment for James A. FitzPatrick Nuclear Power Plant (JAF), Unit 1; by focusing on the three standards set forth in 10 CFR 50.92, "Issuance of amendment," as discussed below:

1. Does the proposed change involve a significant increase in the probability or consequences of an accident previously evaluated?

   Response: No

   The proposed change allows a delay time before declaring supported Technical Specification (TS) systems inoperable when the associated snubber(s) cannot perform its required safety function. Entrance into Actions or delaying entrance into Actions is not an initiator of any accident previously evaluated. Consequently, the probability of an accident previously evaluated is not significantly increased. The consequences of an accident while relying on the delay time allowed before declaring a TS supported system inoperable and taking its Actions are no different than the consequences of an accident under the same plant conditions while relying on the existing TS supported system Actions. Therefore, the consequences of an accident previously evaluated are not significantly increased by this change. Therefore, the proposed change does not involve a significant increase in the probability or consequences of an accident previously evaluated.

2. Does the proposed change create the possibility of a new or different kind of accident from any accident previously evaluated?

   Response: No

The proposed change allows a delay time before declaring supported TS systems inoperable when the associated snubber(s) cannot perform its required safety function. The proposed change does not involve a physical alteration of the plant (no new or different type of equipment will be installed) or a change in the methods governing normal plant operation. Therefore, the proposed change does not create the possibility of a new or different kind of accident from any accident previously evaluated.

3. Does the proposed change involve a significant reduction in a margin of safety?

   Response: No

   The proposed change allows a delay time before declaring supported TS Systems inoperable when the associated snubber(s) cannot perform its required safety function. The proposed change restores an allowance in the pre-Improved Standard Technical Specifications (ISTS) conversion TS that was unintentionally eliminated by the conversion. The pre-ISTS TS were considered to provide an adequate margin of safety for plant operation, as does post-ISTS conversion TS. Therefore, the proposed change does not involve a significant reduction in a margin of safety.

Based on the above, Exelon concludes that the proposed amendment does not involve a significant hazards consideration under the standards set forth in 10 CFR 50.92(c), and, accordingly, a finding of no significant hazards consideration is justified.

In conclusion, based on the considerations discussed above, (1) there is reasonable assurance that the health and safety of the public will not be endangered by operation in the proposed manner, (2) such activities will be conducted in compliance with the Commission's regulations, and (3) the issuance of the proposed change will not be inimical to the common defense and security or to the health and safety of the public.

3.2 Verification and Commitments

As discussed in the Model Application, Section 3.2, provided in the Notice of Availability published in the *Federal Register* on May 4, 2005, for this TS improvement, plant-specific verifications were performed as follows:

- Exelon proposes in this amendment request for JAF TS Bases for LCO 3.0.8 which provide guidance and details on how to implement the new requirements (see Attachment 3, Insert 2). LCO 3.0.8 will require that risk be managed and assessed. The proposed TS Bases state that while the Industry and NRC guidance on implementation of 10 CFR 50.65(a)(4), the Maintenance Rule, does not address seismic risk, LCO 3.0.8 should be considered with respect to other plant maintenance activities, and integrated into the existing Maintenance Rule process to the extent possible so that maintenance on any unaffected train or subsystem is properly controlled, and emergent issues are properly addressed. The risk assessment need not be quantified, but may be a qualitative assessment of the vulnerability of systems and components when one or more snubbers are not able to perform their associated support function. Exelon will revise the TS Bases as proposed above with implementation of the amendment.

- JAF has a TS Bases Control Program consistent with Section 5.5 of the Standard Technical Specifications.

In addition, as discussed in the Model SE, Section 3.1.2 provided in the Notice of Availability published in the *Federal Register* on May 4, 2005, the following restrictions, applicable to BWR plants, are provided to prevent potentially high-risk configurations (hereafter referred to as the Tier 2 restrictions). The specific information which describes how Exelon proposes to ensure that operation at JAF will be in accordance with the Tier 2 requirements is provided below:

1. For BWR plants, one of the following two means of heat removal must be available when LCO 3.0.8.a is used:

   a. At least one high pressure makeup path (e.g., using high pressure coolant injection (HPCI) or reactor core isolation cooling (RCIC) or equivalent) and heat removal capability (e.g., suppression pool cooling), including a minimum set of supporting equipment, not associated with the inoperable snubber(s), or

   b. At least one low pressure makeup path (e.g., low pressure coolant injection (LPCI) or core spray (CS)) and heat removal capability (e.g., suppression pool cooling or shutdown cooling), including a minimum set of supporting equipment, not associated with the inoperable snubber(s).

2. When LCO 3.0.8.b is used at BWR plants, it must be verified that at least one success path exists, using equipment not associated with the inoperable snubber(s), to provide makeup and core cooling needed to mitigate Loss of Offsite Power (LOOP) accident sequences (i.e., initiated by a seismically-induced LOOP event with concurrent loss of all safety system trains supported by the out-of-service snubbers).

To ensure the above requirements are satisfied, they are being included in the proposed TS Bases (Attachment 3, Insert 2) and will be implemented through the appropriate plant procedures and administrative controls upon implementation of the amendment.

In addition to the Tier 2 restrictions discussed above, Section 3.2, Item 1(e), of the Model SE requires that appropriate plant procedures and administrative controls be used to implement the following restriction, described, and responded to by Exelon below:

- Every time the provisions of LCO 3.0.8 are used licensees will be required to confirm that at least one train (or subsystem) of systems supported by the inoperable snubbers would remain capable of performing their required safety or support functions for postulated design loads other than seismic loads. LCO 3.0.8 does not apply to non-seismic snubbers. In addition, a record of the design function of the inoperable snubber (i.e., seismic vs. non-seismic), implementation of any applicable Tier 2 restrictions, and the associated plant configuration shall be available on a recoverable basis for staff inspection.

To ensure the above requirement is satisfied, it is being included in the proposed TS Bases (Attachment 3, Insert 2) and will be implemented through the appropriate plant procedures and administrative controls upon implementation of the amendment.

The inclusion of these configuration restrictions in the TS Bases will ensure that they are retained and controlled in accordance with the TS Bases Control Program as defined in Administrative Controls TS Section 5.4, "Procedures" of the JAF TS.

4.0 ENVIRONMENTAL EVALUATION

A review has determined that the proposed amendment would change a requirement with respect to installation or use of a facility component located within the restricted area as defined in 10 CFR 20, or would change an inspection or surveillance requirement. However, the proposed amendment does not involve (i) a significant hazards consideration, (ii) a significant change in the types or significant increase in the amounts of any effluent that may be released offsite, or (iii) a significant increase in individual or cumulative occupational radiation exposure. Accordingly, the proposed amendment meets the eligibility criterion for categorical exclusion set forth in 10 CFR 51.22(c)(9). Therefore, pursuant to 10 CFR 51.22(b), no environmental impact statement or environmental assessment need be prepared in connection with the proposed amendment.

ATTACHMENT 2

License Amendment Request

James A. FitzPatrick Nuclear Power Plant, Unit 1
Docket No. 50-333

Application to Adopt TSTF-372,
"Addition of LCO 3.0.8, Inoperability of Snubbers"

Proposed Technical Specification Changes (Mark-Ups)

Unit 1

TS page 3.0-1
TS page 3.0-3

3.0 LIMITING CONDITION FOR OPERATION (LCO) APPLICABILITY

LCO 3.0.1	LCOs shall be met during the MODES or other specified conditions in the Applicability, except as provided in LCO 3.0.2 and LCO 3.0.7 and LCO 3.0.8.
LCO 3.0.2	Upon discovery of a failure to meet an LCO, the Required Actions of the associated Conditions shall be met, except as provided in LCO 3.0.5 and LCO 3.0.6.
LCO 3.0.3	When an LCO is not met and the associated ACTIONS are not met, an associated ACTION is not provided, or if directed by the associated ACTIONS, the plant shall be placed in a MODE or other specified condition in which the LCO is not applicable. Action shall be initiated within 1hour to place the plant, as applicable, in: a. MODE 2 within 7 hours; b. MODE 3 within 13 hours; and c. MODE 4 within 37 hours. Exceptions to this Specification are stated in the individual Specifications. Where corrective measures are completed that permit operation in accordance with the LCO or ACTIONS, completion of the actions required by LCO 3.0.3 is not required. LCO 3.0.3 is only applicable in MODES 1, 2, and 3.
LCO 3.0.4	When an LCO is not met, entry into a MODE or other specified condition in the Applicability shall only be made: a. When the associated ACTIONS to be entered permit continued operation in the MODE or other specified condition in the Applicability for an unlimited period of time; (continued)

LCO APPLICABILITY (continued)

LCO 3.0.7	Special Operations LCOs in Section 3.10 allow specified Technical Specifications (TS) requirements to be changed to permit performance of special tests and operations. Unless otherwise specified, all other TS requirements remain unchanged. Compliance with Special Operations LCOs is optional. When a Special Operations LCO is desired to be met but is not met, the ACTIONS of the Special Operations LCO shall be met. When a Special Operations LCO is not desired to be met, entry into a MODE or other specified condition in the Applicability shall only be made in accordance with the other applicable Specifications.
LCO 3.0.8	When one or more required snubbers are unable to perform their associated support function(s), any affected supported LCOs are not required to be declared not met solely for this reason if risk is assessed and managed, and: a. the snubbers not able to perform their associated support function(s) are associated with only one train or subsystem of a multiple train or subsystem supported system or are associated with a single train or subsystem supported system and are able to perform their associated support function within 72 hours; or b. the snubbers not able to perform their associated support function(s) are associated with more than one train or subsystem of a multiple train or subsystem supported system and are able to perform their associated support function within 12 hours. At the end of the specified period, the required snubbers must be able to perform their associated support function(s), or the affected supported system LCOs shall be declared not met.

ATTACHMENT 3

License Amendment Request

James A. FitzPatrick Nuclear Power Plant, Unit 1
Docket Nos. 50-333

Application to Adopt TSTF-372,
"Addition of LCO 3.0.8, Inoperability of Snubbers"

Proposed Technical Specification Bases Changes (Mark-Ups)
(For Information Only)

Unit 1

TS Bases page B 3.0-1
TS Bases page B 3.0-13
TS Bases page B 3.0-14
TS Bases page B 3.0-15

B 3.0 LIMITING CONDITION FOR OPERATION (LCO) APPLICABILITY

BASES

LCOs	LCO 3.0.1 through LCO 3.0.~~8~~7 establish the general requirements applicable to all Specifications in Sections through 3.10 and apply at all times, unless otherwise stated.
LCO 3.0.1	LCO 3.0.1 establishes the Applicability statement within each individual Specification as the requirement for when the LCO is required to be met (i.e., when the plant is in the MODES or other specified conditions of the Applicability statement of each Specification).
LCO 3.0.2	LCO 3.0.2 establishes that upon discovery of a failure to meet an LCO, the associated ACTIONS shall be met. The Completion Time of each Required Action for an ACTIONS Condition is applicable from the point in time that an ACTIONS Condition is entered. The Required Actions establish those remedial measures that must be taken within specified Completion Times when the requirements of an LCO are not met. This Specification establishes that: a. Completion of the Required Actions within the specified Completion Times constitutes compliance with a Specification: and b. Completion of the Required Actions is not required when an LCO is met within the specified Completion Time, unless otherwise specified. There are two basic types of Required Actions. The first type of Required Action specifies a time limit in which the LCO must be met. This time limit is the Completion Time to restore an inoperable system or component to OPERABLE status or to restore variables to within specified limits. If this type of Required Action is not completed within the specified Completion Time, a shutdown may be required to place the plant in a MODE or condition in which the Specification is not applicable. (Whether stated as a Required Action or not, correction of the entered Condition is an action that may always be considered upon entering ACTIONS.) The second type of Required Action specifies the remedial measures that permit continued operation of the plant that is not further restricted by the Completion Time. In this case, compliance with the Required Actions provides an acceptable level of safety for continued operation.

B 3.0 LIMITING CONDITION FOR OPERATION (LCO) APPLICABILITY

BASES

LCO 3.0.7 (continued)

The Applicability of a Special Operations LCO represents a condition not necessarily in compliance with the normal requirements of the TS. Compliance with Special Operations LCOs is optional. A special operation may be performed either under the provisions of the appropriate Special Operations LCO or under the other applicable TS requirements. If it is desired to perform the special operation under the provisions of the Special Operations LCO, the requirements of the Special Operations LCO shall be followed. When a Special Operations LCO requires another LCO to be met, only the requirements of the LCO statement are required to be met regardless of that LCO's Applicability (i.e., should the requirements of this other LCO not be met, the ACTIONS of the Special Operations LCO apply, not the ACTIONS of the other LCO). However, there are instances where the Special Operations LCO's ACTIONS may direct the other LCO's ACTIONS be met. The Surveillances of the other LCO are not required to be met, unless specified in the Special Operations LCO. If conditions exist such that the Applicability of any other LCO is met, all the other LCO's requirements (ACTIONS and SRs) are required to be met concurrent with the requirements of the Special Operations LCO.

LCO 3.0.8

Specification 3.0.8 establishes conditions under which systems are considered to remain capable of performing their intended safety function when associated snubbers are not capable of providing their associated support function(s). This Specification states that the supported system is not considered to be inoperable solely due to one or more snubbers not capable of performing their associated support function(s). This is appropriate because a limited length of time is allowed for maintenance, testing, or repair of one or more snubbers not capable of performing their associated support function(s) and appropriate compensatory measures are specified in the snubber requirements, which are located outside of the TSs under licensee control. The snubber requirements do not meet the criteria in 10 CFR 50.36(c)(2)(ii), and, as such, are appropriate for control by the licensee.

If the allowed time expires and the snubber(s) are unable to perform their associated support function(s), the affected supported system's LCO must be declared not met and the associated ACTION requirements shall be met in accordance with Specification 3.0.2.

(continued)

B 3.0 LIMITING CONDITION FOR OPERATION (LCO) APPLICABILITY

BASES

LCO 3.0.8 (continued)

Specification 3.0.8.a applies when one or more snubbers are not capable of providing their associated support function(s) to a single train or subsystem of a multiple train or subsystem supported system or to a single train or subsystem supported system. Specification 3.0.8.a allows 72 hours to restore the snubber(s) before declaring the supported system inoperable. The 72-hour Completion Time is reasonable based on the low probability of a seismic event concurrent with an event that would require operation of the supported system occurring while the snubber(s) are not capable of performing their associated support function and due to the availability of the redundant train of the supported system.

Specification 3.0.8.b applies when one or more snubbers are not capable of providing their associated support function(s) to more than one train or subsystem of a multiple train or subsystem supported system. Specification 3.0.8.b allows 12 hours to restore the snubber(s) before declaring the supported system inoperable. The 12-hour Completion Time is reasonable based on the low probability of a seismic event concurrent with an event that would require operation of the supported system occurring while the snubber(s) are not capable of performing their associated support function.

The following configuration restrictions shall be applied to the use of Specification 3.0.8:

(1) Specification 3.0.8.a can only be used if one of the following two means of heat removal is available:

a. At least one high pressure makeup path (e.g., using High Pressure Coolant Injection (HPCI) or Reactor Core Isolation Cooling (RCIC) or its equivalent) and heat removal capability (e.g., suppression pool cooling), including a minimum set of supporting equipment required for success, not associated with the inoperable snubber(s), or

b. At least one low pressure makeup path (e.g., Low Pressure Coolant Injection (LPCI) or Core Spray (CS)) and heat removal capability (e.g., suppression pool cooling or shutdown cooling), including a minimum set of supporting equipment required for success, not associated with the inoperable snubber(s).

(continued)

B 3.0 LIMITING CONDITION FOR OPERATION (LCO) APPLICABILITY

BASES

LCO 3.0.8 (continued)

(2) Specification 3.0.8.b can only be used following verification that at least one success path exists, using equipment not associated with the inoperable snubber(s), to provide makeup and core cooling needed to mitigate Loss of Offsite Power (LOOP) accident sequences (i.e., initiated by a seismically-induced LOOP event with concurrent loss of all safety system trains supported by the out-of-service snubbers).

Specification 3.0.8 only applies to the seismic function of snubbers; it does not apply to the non-seismic functions of snubbers. Therefore, each use of Specification 3.0.8 for seismic snubbers that also have non-seismic functions requires confirmation that at least one train (or subsystem) of systems supported by the inoperable snubbers would remain capable of performing their required safety or support functions for postulated design loads other than seismic loads. In addition, a record of the design function of the inoperable snubber (i.e., seismic vs. non-seismic), implementation and compliance with the configuration restrictions defined above, and the associated plant configuration shall be available on a recoverable basis for NRC inspection.

Specification 3.0.8 requires that risk be assessed and managed. Industry and NRC guidance on the implementation of 10 CFR 50.65(a)(4) (i.e., the Maintenance Rule) does not address seismic risk. However, use of Specification 3.0.8 should be considered with respect to other plant maintenance activities, and integrated into the existing Maintenance Rule process to the extent possible so that maintenance on any unaffected train or subsystem is properly controlled, and emergent issues are properly addressed. The risk assessment need not be quantified but may be a qualitative awareness of the vulnerability of systems and components when one or more snubbers are not able to perform their associated support function.