Exelon Generation
4300 Winfield Road
Warrenville, IL 60555

www.exeloncorp.com

Exelon Nuclear

10 CFR 50.90

RS-02-175

October 10, 2002

U. S. Nuclear Regulatory Commission
ATTN: Document Control Desk
Washington, DC 20555-0001

Dresden Nuclear Power Station, Units 2 and 3
Facility Operating License Nos. DPR-19 and DPR-25
NRC Docket Nos. 50-237 and 50-249

Subject: Request for Technical Specifications Changes Related to Main Steam Safety Valve Operability Requirements

In accordance with 10 CFR 50.90, "Application for amendment of license or construction permit," Exelon Generation Company (Exelon), LLC, requests changes to the Technical Specifications (TS) of Facility License Nos. DPR-19 and DPR-25 for the Dresden Nuclear Power Station (DNPS), Units 2 and 3. Specifically, the proposed changes increase the number of main steam safety valves that are required to be operable from eight to nine. DNPS, Units 2 and 3 each have eight safety valves and one combination safety/relief valve. These changes support reactor fuel designs in future operating cycles at DNPS which result in an increase in the analyzed reactor pressure vessel (RPV) steam dome pressure during the most severe pressurization transient. The increase in the required number of safety valves will ensure that the analyzed RPV steam dome pressure remains below the TS safety limit for RPV steam dome pressure during the most severe pressurization transient. In addition, we propose to revise the surveillance requirements to add the required setpoint for the ninth safety valve.

The proposed changes are needed during the second half of the next operating cycle for DNPS, Unit 3 (D3C18), which is scheduled to begin in October 2002. The pressurization transient analysis for D3C18 shows that the current TS requirement for eight main steam safety valves is adequate for at least eighteen months of operation. Exelon requests approval of the proposed TS changes by October 31, 2003, which is approximately one year following the scheduled beginning of D3C18. For DNPS, Unit 2, the proposed changes will not be needed until at least eighteen months of operation in the next operating cycle, which is scheduled to begin in November 2003. However, the proposed change is conservative for DNPS, Unit 2. Therefore, once approved, the proposed TS changes shall be implemented for both units within 30 days.

This request is subdivided as follows.

1. Attachment A provides a description and safety analysis of the proposed changes.

2. Attachment B provides the marked-up TS pages indicating the proposed changes. A marked-up copy of the affected TS Bases is also included for informational purposes.

A001

3. Attachment C provides the revised TS pages for the proposed changes.

4. Attachment D provides our evaluation performed using the criteria in 10 CFR 50.91(a), "Notice for public comment," paragraph (1), which provides information supporting a finding of no significant hazards consideration using the standards in 10 CFR 50.92, "Issuance of amendment," paragraph (c).

5. Attachment E provides information supporting an Environmental Assessment.

These proposed TS changes have been reviewed by the DNPS Plant Operations Review Committee and approved by the Nuclear Safety Review Board in accordance with the requirements of the Exelon Quality Assurance Program.

Exelon is notifying the State of Illinois of this request for a change to the TS by transmitting a copy of this letter and its attachments to the designated State Official.

Should you have any questions concerning his letter, please contact Mr. Allan R. Haeger at (630) 657-2807.

Respectfully,

Patrick R. Simpson

Patrick R. Simpson
Manager - Licensing
Mid-West Regional Operating Group

Attachments: Affidavit
Attachment A: Description and Safety Analysis for Proposed Changes
Attachment B: Marked-Up TS Pages for Proposed Changes
Attachment C: Revised TS Pages for Proposed Changes
Attachment D: Information Supporting a Finding of No Significant Hazards Consideration
Attachment E: Information Supporting an Environmental Assessment

cc: Regional Administrator – NRC Region III
NRC Senior Resident Inspector – Dresden Nuclear Power Station
Office of Nuclear Facility Safety – Illinois Department of Nuclear Safety

STATE OF ILLINOIS)

COUNTY OF DUPAGE)

IN THE MATTER OF)

EXELON GENERATION COMPANY, LLC) Docket Numbers

DRESDEN NUCLEAR POWER STATION, UNITS 2 AND 3) 50-237 and 50-249

SUBJECT: Request for Technical Specifications Changes Related to Main Steam Safety Valve Operability Requirements

AFFIDAVIT

I affirm that the content of this transmittal is true and correct to the best of my knowledge, information, and belief.

Patrick R. Simpson

Patrick R. Simpson
Manager – Licensing
Mid-West Regional Operating Group

Subscribed and sworn to before me, a Notary Public in and

for the State above named, this 10th day of

October, 2002

"OFFICIAL SEAL"
TIMOTHY A. BYAM
NOTARY PUBLIC STATE OF ILLINOIS
COMMISSION EXPIRES 12/04/05

Notary Public

Attachment A

DESCRIPTION AND SAFETY ANALYSIS FOR PROPOSED CHANGES

A. SUMMARY OF THE PROPOSED CHANGES

In accordance with 10 CFR 50.90, "Application for amendment of license or construction permit," Exelon Generation Company (Exelon), LLC, requests a change to Appendix A, Technical Specifications (TS), of Facility License Nos. DPR-19 and DPR-25 for the Dresden Nuclear Power Station (DNPS), Units 2 and 3. Specifically, Exelon proposes to revise the Limiting Condition for Operation (LCO) in TS Section 3.4.3, "Safety and Relief Valves," by increasing the required number of operable main steam safety valves from eight to nine. In addition, we propose to revise Surveillance Requirement (SR) 3.4.3.1 by adding the required setpoint for the ninth safety valve. These changes support reactor fuel designs in future operating cycles at DNPS which will result in an increase in the analyzed reactor pressure vessel (RPV) steam dome pressure during the most severe pressurization transient. The increase in the required number of safety valves will ensure that the analyzed RPV steam dome pressure remains below the TS safety limit (SL) for RPV steam dome pressure during the most severe pressurization transient.

A complete description of the proposed changes is given in Section E, "Description of the Proposed Changes," of this attachment. Attachment B provides the marked-up TS pages indicating the proposed changes. Attachment B also provides a marked up copy of the TS Bases for informational purposes. Attachment C provides the revised TS pages.

B. DESCRIPTION OF THE CURRENT REQUIREMENTS

TS Section 3.4.3 provides the requirements for main steam safety valves. The LCO states, in part, "The safety function of 8 safety valves shall be OPERABLE."

SR 3.4.3.1 requires verification that the safety function lift setpoints of the safety valves are as follows.

Number of Safety Valves	Setpoint (psig)
2	1240 $\pm$ 12.4
2	1250 $\pm$ 12.5
4	1260 $\pm$ 12.6

C. BASES FOR THE CURRENT REQUIREMENTS

The American Society of Mechanical Engineers (ASME) Boiler and Pressure Vessel Code requires the reactor pressure vessel be protected from overpressure during upset conditions by self-actuated safety valves. As part of the nuclear pressure relief system, the size and number of safety valves are selected such that peak pressure in the nuclear system will not exceed the ASME Code limits for the reactor coolant pressure boundary. At DNPS, each unit is designed with nine safety valves, one of which also functions in the relief mode. This valve is a dual function Target Rock safety/relief valve (S/RV).

The overpressure protection system must accommodate the most severe pressurization transient. Evaluations have determined that the most severe transient is the closure of all main steam isolation valves (MSIVs), followed by a reactor scram on high neutron flux (i.e., failure of the direct scram associated with MSIV position). For the purpose of the analyses, eight safety valves are currently assumed to operate in the safety mode. The relief valves and S/RV are not currently credited to function during this event. The analysis results demonstrate that the design safety valve capacity is capable of maintaining reactor pressure below the ASME Code limit of 110% of vessel design pressure (110% x 1250 psig = 1375 psig). This LCO helps to ensure that the acceptance limit of 1375 psig for reactor vessel pressure and the corresponding TS SL of 1345 psig for the reactor vessel steam dome pressure are met during the design basis event.

SR 3.4.3.1 verifies that the safety valves will open at the pressures assumed in the safety analysis. The lift setting pressures correspond to ambient conditions of the valves at nominal operating temperatures and pressures. The safety valve setpoint tolerance is ± 1%.

D. NEED FOR REVISION OF THE REQUIREMENTS

The proposed changes support reactor fuel designs in future operating cycles at DNPS which will result in an increase in the analyzed RPV steam dome pressure during the most severe pressurization transient.

The fuel designs for future DNPS operating cycles will minimize the number of fresh fuel assemblies loaded, in order to reduce the costs associated with fuel assembly fabrication. This requires placing more energy into each fresh fuel assembly to provide the required energy for the cycle. The increased energy in the fresh assemblies results in increased axial power peaking, which results in an increase in the analyzed RPV steam dome pressure response to pressurization transients. The safety analysis for D3C18 indicates that, in the last few months of the cycle, should the reactor power shape become highly top-peaked, the RPV steam dome pressure response to the most severe pressurization transient could exceed the SL of 1345 psig. Given that future operating cycle core designs will continue to minimize the number of fresh assemblies, it is likely that the safety analyses for these cycles will show that the analyzed pressure for the most severe pressurization transient could also exceed the reactor coolant system pressure SL, given similar end-of-cycle top-peaked power shapes.

The current operating cycle for DNPS, Unit 2 does not require this proposed change. The D2C18 axial power shapes are less top peaked than those calculated for D3C18 due to the Unit 2 core design and operating history. The less limiting axial power shapes result in the most severe RPV steam dome pressurization transient meeting the SL of 1345 psig while taking credit for eight safety valves.

The current safety analyses for DNPS only credit the operation of eight safety valves during pressurization transients. This is unnecessarily restrictive, since the safety function of the S/RV is also available to mitigate the effects of the transient. The proposed TS changes will require the safety function of the S/RV to be operable. This will allow crediting of nine safety valves in the pressurization transient analyses, which will maintain the analyzed RPV steam dome pressure response during this transient below the SL.

The addition of the safety function of the S/RV to the required number of operable safety valves requires that its operability be demonstrated in the SRs. Thus, the lift setpoint of the safety function of the S/RV will be added to SR 3.4.3.1.

E. DESCRIPTION OF THE PROPOSED CHANGES

The first portion of the LCO, regarding safety valves for TS Section 3.4.3 is revised to read as follows.

"The safety function of 9 safety valves shall be OPERABLE."

The surveillance requirement for SR 3.4.3.1 is revised to read as follows.

Number of Safety Valves	Setpoint (psig)
1	1135 ± 11.4
2	1240 ± 12.4
2	1250 ± 12.5
4	1260 ± 12.6

These changes are to be implemented prior to DNPS, Unit 3 reaching a D3C18 cycle exposure of 13,800 megawatt days per metric ton of Uranium (MWD/MTU) (i.e., approximately eighteen months of operation following startup from the refueling outage).

F. SAFETY ANALYSIS OF THE PROPOSED CHANGES

The design pressure of the DNPS RPV and reactor coolant pressure boundary is 1250 psig. The acceptance limit for pressurization events is the ASME Code allowable peak pressure of 1375 psig, or 110% of the design pressure. This corresponds to a pressure of 1345 psig when sensed at the reactor steam dome, which is the measurement point for RPV pressure.

The reactor overpressure protection analysis for the limiting event is performed prior to each fuel cycle as part of the fuel reload analyses. This analysis is performed by the Global Nuclear Fuel (GNF) using the NRC-approved methodology GESTAR. For the upcoming fuel cycle for DNPS, Unit 3 (D3C18), GNF performed the reactor overpressure protection analysis using GESTAR Revision 14, which incorporates Amendment 26 to the methodology as approved by the NRC in Reference I.1.

The overpressure protection analysis for D3C18 was performed for the limiting MSIV closure event using the standard input parameters and assumptions as described in the GESTAR methodology. Specific input parameters and assumptions include the following.

Parameter	Assumption
Initial RPV pressure	1005 psig
Initial reactor thermal power	102% of rated thermal power (3016 megawatts – thermal)
Reactor core flow	Analyses were performed at both 100% rated core flow and 108% rated core flow to ensure most severe conditions.
Reactor scram initiator	Reactor scram is initiated on high neutron flux. The direct scram on MSIV position is not credited.

Besides the parameters listed above, the maximum pressure achieved during a pressurization transient depends significantly on the capacity of the installed main steam safety valves and also on the axial power shape of the reactor core. Increased safety valve capacity decreases the maximum pressure response to the event. A highly top-peaked axial power shape increases the maximum pressure response. During an operating cycle, the power shape becomes more top peaked as fuel in the lower regions of the core is depleted more rapidly during the early portion of the cycle. Thus, the maximum pressure achieved during pressurization events is greatest at the end of the operating cycle.

For D3C18, analyses were performed with the worst case expected top peaked power shape at two points in the operating cycle to ensure that the safety valve capacity is adequate for the projected time in the operating cycle. The analysis conditions and the analysis results are listed below.

Time in operating cycle [1]	Number of safety valves assumed to operate	Analysis result for maximum RPV pressure (psig)[2]	Analysis result for maximum steam dome pressure[2]
MOC	8	1363.0	1338.0
EOC	9	1362.2	1338.6

Notes
1. MOC (middle of cycle) – defined as 1,663 MWD/MTU prior to reaching loss of full power capability. The MOC point is conservatively expected to be reached no earlier than a cycle exposure of 13,800 MWD/MTU, which is expected to represent at least eighteen months of operation.
   EOC (end of cycle) – cycle exposure of 17,000 MWD/MTU
2. Analysis results given for the bounding core flow condition.

These analyses show that the RPV and steam dome pressures remain below their acceptance limits of 1375 psig and 1345 psig, respectively. Thus, DNPS, Unit 3 has adequate safety valve capacity with eight main steam safety valves until at least a D3C18 cycle exposure of 13,800 MWD/MTU. At cycle exposures greater than 13,800 MWD/MTU, DNPS, Unit 3 has adequate safety valve capacity with nine main steam safety valves.

Performing the overpressure protection analysis assuming that all nine safety valves operate is appropriate. Prior to D3C18, the fuel cycle analyses were performed assuming the operation of eight main steam safety valves. This allowed for one of the nine main steam safety valves installed at DNPS to be inoperable. However, allowance for an inoperable safety valve is not required either in the NRC-approved GESTAR methodology or by NRC regulations or guidance. Safety valves are passive components which are actuated directly by the pressure in the system they protect. The proposed change will require that sufficient main steam safety valves are operable to ensure that the overpressure analysis assumptions are met. With one or more main steam safety valves inoperable, the TS actions require that the unit be placed in Mode 3 within 12 hours and in Mode 4 within 36 hours. Thus, the unit will be prevented from operating for any significant period of time in a condition in which the overpressure analysis assumptions are not met.

The addition of the SR to verify the lift setpoint of the S/RV is required to ensure that the valve will actuate at the pressure assumed in the overpressure analysis. The lift setting pressure corresponds to ambient conditions of the valve at nominal operating temperature and pressure. The S/RV setpoint tolerance is ± 1%, consistent with the overpressure analysis assumptions.

The DNPS, Unit 2 fuel cycle analyses for the next fuel cycle are not complete. These analyses will be performed assuming that nine safety valves operate. Thus, the proposed change will be applicable to DNPS, Unit 2.

G. IMPACT ON PREVIOUS SUBMITTALS

Exelon has reviewed the proposed changes for impact on any submittals for DNPS currently being reviewed by the NRC, and has determined that there is no impact on any of these submittals.

H. SCHEDULE REQUIREMENTS

The proposed changes are needed prior to achieving cycle exposures of 13,800 MWD/MTU for D3C18, which is scheduled to begin in October 2002. The cycle exposure of 13,800 MWD/MTU is not expected to be reached until at least eighteen months of operation in the cycle. Therefore, Exelon requests approval of the proposed TS changes by October 2003, which is one year following the scheduled beginning of D3C18. For DNPS, Unit 2, the proposed changes will not be needed until at least eighteen months of operation in the next operating cycle, which is scheduled to begin in November 2003. However, the proposed change is conservative for DNPS, Unit 2. Therefore, once approved, the proposed TS changes shall be implemented for both units within 30 days.

I. REFERENCES

1. Letter from U. S. NRC to G. A. Watford (GNF), "Amendment 26 to GE Licensing Topical Report NEDE-24011-P-A (GESTAR II) – Clarifying Classification of BWR-6 Pressure Regulator Failure Downscale Event," dated March 29, 2000

3.4 REACTOR COOLANT SYSTEM (RCS)

3.4.3 Safety and Relief Valves

LCO 3.4.3 The safety function of ~~8~~ 9 safety valves shall be OPERABLE.

<u>AND</u>

The relief function of 5 relief valves shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One relief valve inoperable.	A.1 Restore the relief valve to OPERABLE status.	14 days
B. Required Action and associated Completion Time of Condition A not met. <u>OR</u> Two or more relief valves inoperable. <u>OR</u> One or more safety valves inoperable.	B.1 Be in MODE 3. <u>AND</u> B.2 Be in MODE 4.	12 hours 36 hours

SURVEILLANCE REQUIREMENTS

SURVEILLANCE		FREQUENCY
SR 3.4.3.1	Verify the safety function lift setpoints of the safety valves are as follows: Number of Safety Valves — Setpoint (psig) 1 — 1135 ± 11.4 2 — 1240 ± 12.4 2 — 1250 ± 12.5 4 — 1260 ± 12.6	In accordance with the Inservice Testing Program
SR 3.4.3.2	------------------NOTE------------------ Not required to be performed until 12 hours after reactor steam pressure and flow are adequate to perform the test. -- Verify each relief valve opens when manually actuated.	24 months
SR 3.4.3.3	------------------NOTE------------------ Valve actuation may be excluded. -- Verify each relief valve actuates on an actual or simulated automatic initiation signal.	24 months

BASES

BACKGROUND (continued)

through a discharge line to a point below the minimum water level in the suppression pool. The safety valves discharge directly to the drywell.

In addition to the safety valves and S/RV, each unit is designed with four relief valves which actuate in the relief mode to control RCS pressure during transient conditions to prevent the need for safety valve actuation (except S/RV) following such transients. The relief valves are also located on the main steam lines between the reactor vessel and the first isolation valve within the drywell. The relief valves are of the Electromatic type, which are opened by automatic or manual switch actuation of a solenoid. The switch energizes the solenoid to actuate a plunger, which contacts the pilot valve operating lever, thereby opening the pilot valve. When the pilot valve opens, pressure under the main valve disc is vented. This allows reactor pressure to overcome main valve spring pressure, which forces the main valve disc downward to open the main valve. Two of the five relief valves are the low set relief valves and all of the relief valves, including the S/RV, are Automatic Depressurization System (ADS) valves. The low set relief requirements are specified in LCO 3.6.1.6, "Low Set Relief Valves," and the ADS requirements are specified in LCO 3.5.1, "ECCS—Operating."

APPLICABLE SAFETY ANALYSES

The overpressure protection system must accommodate the most severe pressurization transient. Evaluations have determined that the most severe transient is the closure of all main steam isolation valves (MSIVs), followed by reactor scram on high neutron flux (i.e., failure of the direct scram associated with MSIV position) (Ref. 1). For the purpose of the analyses, ~~eight~~ all nine safety valves are assumed to operate in the safety mode. The relief valves and the relief function of the S/RV are not credited to function during this event. The analysis results demonstrate that the design safety valve capacity is capable of maintaining reactor pressure below the ASME Code limit of 110% of vessel design pressure (110% x 1250 psig = 1375 psig). This LCO helps to ensure that the acceptance limit of 1375 psig is met during the Design Basis Event.

(continued)

BASES

APPLICABLE SAFETY ANALYSES (continued)

From an overpressure standpoint, the design basis events are bounded by the MSIV closure with flux scram event described above. For other pressurization events, such as a turbine trip or generator load rejection with Main Turbine Bypass System failure (Refs. 2 and 3, respectively), the relief valves as well as the S/RV are assumed to function. The opening of the relief valves during the pressurization event mitigates the increase in reactor vessel pressure, which affects the MINIMUM CRITICAL POWER RATIO (MCPR) during these events. In these events, the operation of four of the five relief valves are required to mitigate the events. Reference 4 discusses additional events that are expected to actuate the safety and relief valves.

Safety and relief valves satisfy Criterion 3 of 10 CFR 50.36(c)(2)(ii).

LCO

The safety function of ~~eight~~ all nine safety valves are required to be OPERABLE to satisfy the assumptions of the safety analysis (Ref. 1). The safety valve requirements of this LCO are applicable to the capability of the safety valves to mechanically open to relieve excess pressure when the lift setpoint is exceeded (safety function).

The safety valve setpoints are established to ensure that the ASME Code limit on peak reactor pressure is satisfied. The ASME Code specifications require the lowest safety valve setpoint to be at or below vessel design pressure (1250 psig) and the highest safety valve to be set so that the total accumulated pressure does not exceed 110% of the design pressure for overpressurization conditions. The transient evaluations in the UFSAR are based on these setpoints, but also include the additional uncertainties of ± 1% of the nominal setpoint drift to provide an added degree of conservatism.

Operation with fewer valves OPERABLE than specified, or with setpoints outside the ASME limits, could result in a more severe reactor response to a transient than predicted, possibly resulting in the ASME Code limit on reactor pressure being exceeded.

(continued)

BASES

LCO
(continued)

The relief valves, including the S/RV, are required to be OPERABLE to limit peak pressure in the main steam lines and maintain reactor pressure within acceptable limits during events that cause rapid pressurization, so that MCPR is not exceeded.

APPLICABILITY

all nine

In MODES 1, 2, and 3, ~~eight~~ safety valves (not including the S/RV) and five relief valves (including the S/RV) must be OPERABLE, since considerable energy may be in the reactor core and the limiting design basis transients are assumed to occur in these MODES. The safety and relief valves may be required to provide pressure relief to discharge energy from the core until such time that the Shutdown Cooling (SDC) System is capable of dissipating the core heat.

In MODE 4, decay heat is low enough for the Shutdown Cooling System to provide adequate cooling, and reactor pressure is low enough that the overpressure and MCPR limits are unlikely to be approached by assumed operational transients or accidents. In MODE 5, the reactor vessel head is unbolted or removed and the reactor is at atmospheric pressure. The safety and relief functions are not needed during these conditions.

ACTIONS

A.1

With the relief function of one relief valve (or S/RV) inoperable, the remaining OPERABLE relief valves are capable of providing the necessary protection. However, the overall reliability of the pressure relief system is reduced because additional failures in the remaining OPERABLE relief valves could result in failure to adequately relieve pressure during a limiting event. For this reason, continued operation is permitted for a limited time only.

The 14 day Completion Time to restore the inoperable required relief valve to OPERABLE status is based on the relief capability of the remaining relief valves, the low probability of an event requiring relief valve actuation, and a reasonable time to complete the Required Action.

(continued)

Attachment C

REVISED TECHNICAL SPECIFICATIONS PAGES FOR PROPOSED CHANGES

<u>REVISED TS PAGES</u>

3.4.3-1
3.4.3-2

3.4 REACTOR COOLANT SYSTEM (RCS)

3.4.3 Safety and Relief Valves

LCO 3.4.3 The safety function of 9 safety valves shall be OPERABLE.

AND

The relief function of 5 relief valves shall be OPERABLE.

APPLICABILITY: MODES 1, 2, and 3.

ACTIONS

CONDITION	REQUIRED ACTION	COMPLETION TIME
A. One relief valve inoperable.	A.1 Restore the relief valve to OPERABLE status.	14 days
B. Required Action and associated Completion Time of Condition A not met. OR Two or more relief valves inoperable. OR One or more safety valves inoperable.	B.1 Be in MODE 3. AND B.2 Be in MODE 4.	12 hours 36 hours

SURVEILLANCE REQUIREMENTS

SURVEILLANCE		FREQUENCY
SR 3.4.3.1	Verify the safety function lift setpoints of the safety valves are as follows: Number of Safety Valves — Setpoint (psig) 1 — 1135 ± 11.4 2 — 1240 ± 12.4 2 — 1250 ± 12.5 4 — 1260 ± 12.6	In accordance with the Inservice Testing Program
SR 3.4.3.2	------------------NOTE------------------ Not required to be performed until 12 hours after reactor steam pressure and flow are adequate to perform the test. -- Verify each relief valve opens when manually actuated.	24 months
SR 3.4.3.3	------------------NOTE------------------ Valve actuation may be excluded. -- Verify each relief valve actuates on an actual or simulated automatic initiation signal.	24 months

Attachment D

INFORMATION SUPPORTING A FINDING OF NO SIGNIFICANT HAZARDS CONSIDERATION

According to 10 CFR 50.92, "Issuance of amendment," paragraph (c) a proposed amendment to an operating license involves no significant hazards consideration if operation of the facility in accordance with the proposed amendment would not:

(1) Involve a significant increase in the probability or consequences of an accident previously evaluated; or

(2) Create the possibility of a new or different kind of accident from any accident previously evaluated; or

(3) Involve a significant reduction in a margin of safety.

In support of this determination, an evaluation of each of the three criteria set forth in 10 CFR 50.92 is provided below regarding the proposed license amendment.

Overview

In accordance with 10 CFR 50.90, "Application for amendment of license or construction permit," Exelon Generation Company (Exelon), LLC, is requesting changes to Appendix A, Technical Specifications (TS), of Facility Operating License Nos. DPR-19 and DPR-25 for Dresden Nuclear Power Station, Units 2 and 3. The proposed changes increase the number of safety valves required to be operable from eight to nine and add the requirement to verify the lift setpoint of the ninth safety valve. These changes support reactor fuel designs in future operating cycles at DNPS which will result in an increase in the analyzed reactor pressure vessel (RPV) steam dome pressure during the most severe pressurization transient. The increase in the required number of safety valves will ensure that the analyzed RPV steam dome pressure remains below the TS safety limit for RPV steam dome pressure during the most severe pressurization transient.

The proposed TS changes do not involve a significant increase in the probability or consequences of an accident previously evaluated.

The proposed Technical Specifications (TS) changes require an additional safety valve to be operable. The proposed change also adds the requirement to verify the lift setpoint of this additional safety valve. TS requirements that govern operability or routine testing of plant components are not assumed to be initiators of any analyzed event because these components are intended to prevent, detect, or mitigate accidents. Therefore, these changes will not involve an increase in the probability of an accident previously evaluated.

The proposed changes ensure that the reactor pressure vessel (RPV) steam dome pressure response is maintained within established limits in order to maintain the analyzed response of the RPV steam dome pressure below the safety limit for this parameter during the most severe pressurization transient. This ensures that the reactor coolant system integrity will be maintained during this transient. Thus, the proposed change does not involve an increase in the consequences of an accident previously evaluated.

In summary, the proposed changes do not involve a significant increase in the probability or consequences of an accident previously evaluated.

Attachment D

INFORMATION SUPPORTING A FINDING OF NO SIGNIFICANT HAZARDS CONSIDERATION

The proposed TS changes do not create the possibility of a new or different kind of accident from any accident previously evaluated.

The proposed changes do not affect the manner in which plant systems will be operated under normal and abnormal operating conditions. Therefore, these changes will not create the possibility of a new or different kind of accident from any accident previously evaluated.

The proposed TS changes do not involve a significant reduction in a margin of safety.

The proposed changes ensure that the RPV steam dome pressure response is maintained within established limits in order to maintain the analyzed response of the RPV steam dome pressure below the safety limit for this parameter during the most severe pressurization transient. Ensuring the safety limit is met for this transient ensures that RCS integrity will be maintained. Therefore, the proposed changes do not result in a reduction in the margin of safety.

Conclusion

Based upon the above evaluation, Exelon has concluded that the criteria of 10 CFR 50.92(c) are satisfied and that the proposed TS changes involve no significant hazards consideration.

Attachment E

INFORMATION SUPPORTING AN ENVIRONMENTAL ASSESSMENT

Exelon Generation Company (Exelon), LLC has evaluated these proposed changes against the criteria for identification of licensing and regulatory actions requiring environmental assessment in accordance with 10 CFR 51.21, "Criteria for and identification of licensing and regulatory actions requiring environmental assessments." Exelon has determined that these proposed changes meet the criteria for a categorical exclusion set forth in 10 CFR 51.22, "Criterion for categorical exclusion; identification of licensing and regulatory actions eligible for categorical exclusion or otherwise not requiring environmental review," paragraph (c)(9), and as such, has determined that no irreversible consequences exist in accordance with 10 CFR 50.92, "Issuance of amendment," paragraph (b). This determination is based on the fact that these changes are being proposed as an amendment to a license issued pursuant to 10 CFR 50, "Domestic Licensing of Production and Utilization Facilities," which changes a surveillance requirement (SR), and the amendment meets the following specific criteria:

(i) The proposed changes involve no significant hazards consideration.

As demonstrated in Attachment D, the proposed changes do not involve a significant hazards consideration.

(ii) There is no significant change in the types or significant increase in the amounts of any effluent that may be released offsite.

There will be no significant increase in the amounts of any effluents released offsite. The proposed changes do not result in an increase in power level, do not increase the production, nor alter the flow path or method of disposal of radioactive waste or byproducts. Therefore, the proposed change will not affect the types or increase the amounts of any effluents released offsite.

(iii) There is no significant increase in individual or cumulative occupational radiation exposure.

The proposed changes will not result in changes in the configuration of the facility. There will be no change in the level of controls or methodology used for processing of radioactive effluents or handling of solid radioactive waste, nor will the proposal result in any change in the normal radiation levels within the plant. Therefore, there will be no increase in individual or cumulative occupational radiation exposure resulting from this change.