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NRC Order No. EA-13-109

FLL-14-035

December 16, 2014

U.S. Nuclear Regulatory Commission ATTN: Document Control Desk 11555 Rockville Pike Rockville, MD 20852

Nine Mile Point Nuclear Station, Units 1 and 2

Renewed Facility Operating License Nos. DPR-63 and NPF-69

Docket Nos. 50-220 and 50-410

Subject:

December 2014 Six-Month Status Report in Response to Order EA-13-109 Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions

References:

- (1) NRC Order Number EA-13-109, Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated June 6, 2013 (ML13143A321)
- (2) Letter from M. G. Korsnick (Exelon) to Document Control Desk (NRC), Nine Mile Point Nuclear Station, Units 1 and 2, Overall Integrated Plan per Order EA-13-109 Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated June 27, 2014 (ML14184B340)

On June 6, 2013, the Nuclear Regulatory Commission (NRC) issued Order EA-13-109 (Reference 1) to all licensees that operate boiling-water reactors (BWRs) with Mark I and Mark II containments to ensure that these facilities have a hardened containment vent system (HCVS) to remove decay heat from the containment, and maintain control of containment pressure within acceptable limits following events that result in the loss of active containment heat removal capability while maintaining the capability to operate under severe accident (SA) conditions resulting from an Extended Loss of AC Power (ELAP).

Attachments (1) and (2) provide the first Six-Month Status Reports for Nine Mile Point Nuclear Station, LLC (NMPNS) Unit 1 (NMP1) and Unit 2 (NMP2), respectively. This report updates the milestone accomplishments since the submittal of the Overall Integrated Plan on June 27, 2014 (Reference (2), including any changes to the compliance method, schedule, or need for relief and the basis, if any.

This letter contains no new regulatory commitments.

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If there are any questions regarding this submittal, please contact Bruce Montgomery, Acting Manager - Licensing, at 443-532-6533.

I declare under penalty of perjury that the foregoing is true and correct. Executed on the 16th day of December, 2014.

Sincerely,

Mary G. Korsnick

MGK/STD

Attachments: (1) Six-Month Status Report (December 2014) for Nine Mile Point Unit 1 Overall Integrated Plan for Reliable Hardened Vents

(2) Six-Month Status Report (December 2014) for Nine Mile Point Unit 2 Overall Integrated Plan for Reliable Hardened Vents

cc: Director, Office of Nuclear Reactor Regulation Regional Administrator, Region I, USNRC NRC Project Manager, NMPNS NRC Resident Inspector, NMPNS Mr. William D. Reckley, NRR/JLD/PSB, NRC Mr. Rajender Auluck, NRR/JLD/PSB, NRC

ATTACHMENT (1)

SIX-MONTH STATUS REPORT (DECEMBER 2014) NINE MILE POINT UNIT 1 OVERALL INTEGRATED PLAN FOR RELIABLE HARDENED VENTS

Attachment 1

Nine Mile Point Unit 1 First Six Month Status Report for the Implementation of Order EA-13-109, "Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions"

1 Introduction

Nine Mile Point Unit 1 (NMP1) developed an Overall Integrated Plan (Reference 1), documenting the installation of a Hardened Containment Vent System (HCVS) that provides a reliable hardened venting capability for pre-core damage and under severe accident conditions, including those involving a breach of the reactor vessel by molten core debris, in response to Reference 2. This attachment provides an update of milestone accomplishments since submittal of the Phase 1 Overall Integrated Plan, including any changes to the compliance method, schedule, or need for relief/relaxation and the basis, if any.

2 Milestone Accomplishments

The following milestone(s) have been completed since the development of the Overall Integrated Plan (Reference 1), and are current as of December 1, 2014.

First Six-Month Update (complete with this submittal)

3 Milestone Schedule Status

The following provides an update to Part 5 of the Overall Integrated Plan. It provides the activity status of each item, and whether the expected completion date has changed. The dates are planning dates subject to change as design and implementation details are developed.

Milestone	Target Completion Date	Activity Status	Comments {Include date changes in this column}
Hold preliminary/conceptual design meeting	Nov 2013	Complete	
Submit Overall Integrated Implementation Plan	Jun 2014	Complete	
Submit 6 Month Status Report	Dec 2014	Complete	
Submit 6 Month Status Report	Jun 2015		
Submit 6 Month Status Report	Dec. 2015		Simultaneous with Phase 2 OIP

Nine Mile Point Unit 1 First Six Month Status Report for the Implementation of HCVS Phase 1

Design Engineering Complete	April 2016	
Operations Procedure Changes Developed	Dec 2016	
Site Specific Maintenance Procedure Developed	Dec 2016	
Training Complete	Feb 2017	
NMP1 Implementation Outage	Apr 2017	
Procedure Changes Active	Apr 2017	
Walk Through Demonstration/Functional Test	Apr 2017	
Submit Completion Report	June 2017	

4 Changes to Compliance Method

There are no changes to the compliance method as documented in the Phase 1 Overall Integrated Plan (Reference 1).

5 Need for Relief/Relaxation and Basis for the Relief/Relaxation

NMP1 Station expects to comply with the order implementation date and no relief/relaxation is required at this time.

6 Open Items from Overall Integrated Plan and Interim Staff Evaluation

The following tables provide a summary of the open items documented in the Phase 1 Overall Integrated Plan or the Interim Staff Evaluation (ISE) and the status of each item.

Overall Integrated Plan Phase 1 Open Item	Status
Perform final sizing evaluation for HCVS batteries and battery charger and include in FLEX DG loading calculation	Not Started
Perform final vent capacity calculation for the Torus HCVS piping confirming 1% minimum capacity	Started
Perform final sizing evaluation for pneumatic Nitrogen (N2) supply	Not Started

Nine Mile Point Unit 1 First Six Month Status Report for the Implementation of HCVS Phase 1

4.	Perform confirmatory environmental condition evaluation for the Turbine Building in the vicinity of the Remote Operating Station (ROS) and HCVS dedicated pneumatic supply and batteries	Not Started
5.	State which approach or combination of approaches the plant determines is necessary to address the control of combustible gases downstream of the HCVS control valve	Started
6.	Complete evaluation for environmental/seismic qualification of HCVS components	Not Started
7.	Complete evaluation for environmental conditions and confirm the travel path accessibility	Not Started

Interim Staff Evaluation Open Item	Status
No items at the present time.	

7 Interim Staff Evaluation Impacts

There are no potential impacts to the Interim Staff Evaluation identified at this time.

8 References

The following references support the updates to the Phase 1 Overall Integrated Plan described in this enclosure.

- Letter from M. G. Korsnick to Document Control Desk (NRC), Overall Integrated Plan per Order EA-13-109 Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated June 30, 2014(ML14184B340)
- NRC Order Number EA-13-109, Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions" dated June 6, 2013.(ML13143A321)
- NEI 13-02, Industry Guidance for Compliance with NRC Order EA-13-109, BWR Mark I & II Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated November 2013(ML13316A853)
- NRC Interim Staff Guidance JLD-ISG-2013-02, Compliance with Order EA-13-109, Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated November 2013 (ML13304B836).

ATTACHMENT (2)



Attachment 2

Nine Mile Point Unit 2 First Six Month Status Report for the Implementation of Order EA-13-109, "Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions"

1 Introduction

Nine Mile Point Unit 2 (NMP2) developed an Overall Integrated Plan (Reference 1), documenting the installation of a Hardened Containment Vent System (HCVS) that provides a reliable hardened venting capability for pre-core damage and under severe accident conditions, including those involving a breach of the reactor vessel by molten core debris, in response to Reference 2. This attachment provides an update of milestone accomplishments since submittal of the Phase 1 Overall Integrated Plan, including any changes to the compliance method, schedule, or need for relief/relaxation and the basis, if any.

2 Milestone Accomplishments

The following milestone(s) have been completed since the development of the Overall Integrated Plan (Reference 1), and are current as of December 1, 2014.

First Six-Month Update (complete with this submittal)

3 Milestone Schedule Status

The following provides an update to Part 5 of the Overall Integrated Plan. It provides the activity status of each item, and whether the expected completion date has changed. The dates are planning dates subject to change as design and implementation details are developed.

Milestone	Target Completion Date	Activity Status	Comments {Include date changes in this column}
Hold preliminary/conceptual design meeting	Nov 2013	Complete	
Submit Overall Integrated Implementation Plan	Jun 2014	Complete	
Submit 6 Month Status Report	Dec 2014	Complete	
Design Engineering Complete	Mar 2015		Jun 2015 ¹
Submit 6 Month Status Report	Jun 2015		

¹ Date changed to reflect completion of both outage and non-outage related engineering change packages.

Nine Mile Point Unit 2 First Six Month Status Report for the Implementation of HCVS Phase 1

Operations Procedure Changes Developed	Dec 2015	
Site Specific Maintenance Procedure Developed	Dec 2015	
Submit 6 Month Status Report	Dec. 2015	Simultaneous with Phase 2 OIP
Training Complete	Feb 2016	
NMP2 Implementation Outage	Apr 2016	
Procedure Changes Active	Apr 2016	
Walk Through Demonstration/Functional Test	Apr 2016	
Submit Completion Report	June 2016	

4 Changes to Compliance Method

There are no changes to the compliance method as documented in the Phase 1 Overall Integrated Plan (Reference 1).

5 Need for Relief/Relaxation and Basis for the Relief/Relaxation

NMP2 Station expects to comply with the order implementation date and no relief/relaxation is required at this time.

6 Open Items from Overall Integrated Plan and Interim Staff Evaluation

The following tables provide a summary of the open items documented in the Phase 1 Overall Integrated Plan or the Interim Staff Evaluation (ISE) and the status of each item.

. (Overall Integrated Plan Phase 1 Open Item	Status
1.	Perform final sizing evaluation for HCVS batteries and battery charger and include in FLEX DG loading calculation	Not Started
2.	Perform final vent capacity calculation for the Torus HCVS piping confirming 1% minimum capacity	Started
3.	Perform final sizing evaluation for pneumatic Nitrogen (N2) supply	Not Started

Nine Mile Point Unit 2 First Six Month Status Report for the Implementation of HCVS Phase 1

4.	Perform seismic evaluation of Reactor Building Track Bay	Not Started
5.	State which approach or combination of approaches the plant determines is necessary to address the control of combustible gases downstream of the HCVS control valve	Started
6.	Complete evaluation for environmental/seismic qualification of HCVS components	Not Started
7.	Complete evaluation for environmental conditions and confirm the travel path accessibility	Not Started
8.	Perform final environmental evaluation of the Remote Operating Station (ROS) location.	Not Started

Interim Staff Evaluation Open Item	Status
No items at the present time.	

7 Interim Staff Evaluation Impacts

There are no potential impacts to the Interim Staff Evaluation identified at this time.

8 References

The following references support the updates to the Phase 1 Overall Integrated Plan described in this enclosure.

- Letter from M. G. Korsnick to Document Control Desk (NRC), Overall Integrated Plan per Order EA-13-109 Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated June 30, 2014(ML14184B340)
- NRC Order Number EA-13-109, Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated June 6, 2013(ML13143A321)
- NEI 13-02, Industry Guidance for Compliance with NRC Order EA-13-109, BWR Mark I & II Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated November 2013(ML13316A853)
- NRC Interim Staff Guidance JLD-ISG-2013-02, Compliance with Order EA-13-109, Order Modifying Licenses with Regard to Reliable Hardened Containment Vents Capable of Operation Under Severe Accident Conditions, dated November 2013 (ML13304B836).