SCS ENGINEERS















Post-Closure Care Plan Phase 3 Module 1 Phase 3 Module 2

Phase 4 Module 1

Edgewater I-43 Ash Disposal Facility

Prepared for:

Wisconsin Power and Light Company

Edgewater Generating Station 3739 Lakeshore Drive Sheboygan, Wisconsin 53081-7233

Prepared by:

SCS ENGINEERS

2830 Dairy Drive Madison, Wisconsin 53718-6751 (608) 224-2830

> September 2016 File No. 25216111.00

Offices Nationwide www.scsengineers.com

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Table of Contents

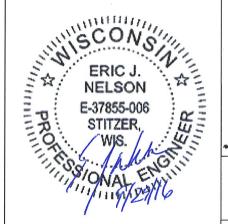
Secti	ion	Page
PE C	Certification	iii
1.0	Introduction and Project Summary	1
2.0	Monitoring and Maintenance Activities	2
	2.1 Final Cover Maintenance	2
	2.2 Leachate Collection/Contact Water Control System A	Naintenance2
	2.3 Groundwater Monitoring and System Maintenance	2
3.0	Post-Closure Period Contacts	3
4.0	Post-Closure Period Site Use	3
5.0	Certifications	
6.0	Recordkeeping and Reporting	3

Figures

- 1 Site Location Map
- 2 Post-Closure Care Plan

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PE CERTIFICATION



I, Eric J. Nelson, hereby certify that this Post-Closure Care Plan meets the requirements of 40 CFR 257.104(d), was prepared by me or under my direct supervision, and that I am a duly licensed Professional Engineer under the laws of the State of Wisconsin.

(printed or typed name)

License number \mathcal{E} -37855- \mathcal{E}

My license renewal date is $\frac{7/31/18}{}$

Pages or sheets covered by this seal:

SEPTEMBER 2016 POST-CLOSURE CARE PLAN
I-43 BY DISPOSAL FACILITY

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1.0 INTRODUCTION AND PROJECT SUMMARY

On behalf of Wisconsin Power and Light (WPL), SCS Engineers (SCS) has prepared this Post-Closure Care Plan for the I-43 Ash Disposal Facility (I-43) in accordance with 40 CFR 257.104(d) as follows.

<u>40 CFR 257.104(d).</u> "Written post-closure plan – (1) Content of the plan. The owner or operator of a CCR unit must prepare a written post-closure plan that includes, as a minimum, the information specified in paragraphs (d)(1)(i) through (iii) of this section."

The I-43 facility includes a closed coal combustion residue (CCR) landfill, which consists of disposal Phase 1 and Phase 2, and an active CCR landfill. The active CCR landfill currently consists of three CCR units in disposal Phase 3 and Phase 4. The two landfills are located on the same property, but are not contiguous. The USEPA CCR rule does not apply to Phase 1 and Phase 2, because they were closed before the effective date of the CCR rule.

The active CCR landfill at I-43 is comprised of three existing CCR units, which are the subject of this Post-Closure Care Plan. These CCR units are listed below along with their current status as it relates to the Post-Closure Care Plan:

- Phase 3, Module 1 this unit has received some final cover over completed outer sideslope areas that will no longer receive additional CCR.
- Phase 3, Module 2 this unit is currently being filled.
- Phase 4, Module 1 this unit has received some final cover over completed outer sideslope areas that will no longer receive additional CCR.

Two future CCR units (Phase 4 Module 2 and Phase 4 Module 3) are permitted with the Wisconsin Department of Natural Resources (WDNR), but have not been developed. The site location is shown on **Figure 1**. **Figure 2** shows proposed final cover grades and monitoring locations.

Phase 3 Module 1 and Phase 4 Module 1 have been partially closed with a final cover as described in the Initial Closure Plan for these CCR units. The remaining open areas of these CCR units will be closed when CCR materials reach final waste grades. The future final cover system is planned to be the same as the existing final cover system. Following the closure of the existing CCR units at the I-43 Ash Disposal Facility, WPL will conduct post-closure care in accordance with 40 CFR 257.104(b) for the required 30 years.

2.0 MONITORING AND MAINTENANCE ACTIVITIES

<u>40 CFR 257.104(d)(1)(i).</u> "A description of the monitoring and maintenance activities required in paragraph (b) of this section for the CCR unit, and the frequency at which these activities will be performed."

Monitoring and Maintenance Activities	Frequency
Mowing	Semi-Annually
Inspections by Owner/Operator	Monthly
Repair to final cover for erosion concerns	As needed, determined by inspection
Sedimentation Basin Cleaning	As needed, determined by inspection
Leachate Collection Line Cleaning	Annually
Environmental Monitoring (groundwater, leachate)	Semi-Annually

The owner/operator will perform monthly inspections of the landfill surface, leachate control system, and groundwater monitoring systems. If issues are noticed during the inspection, action will be taken to remedy the situation. Eroded areas will be repaired and reseeded. Repairs or replacement will be performed on groundwater monitoring system components as needed.

2.1 FINAL COVER MAINTENANCE

Mowing will be performed semi-annually during the growing season unless additional mowing is required in response to the vegetation growth rate. If eroded areas are noted during monthly inspections, WPL will repair and reseed the area.

2.2 LEACHATE COLLECTION/CONTACT WATER CONTROL SYSTEM MAINTENANCE

The three CCR units at the I-43 Ash Disposal Facility are all existing CCR landfills under the Federal CCR Rule (40 CFR 257, Subpart D) and are not subject to the requirements of 257.70; therefore, leachate collection/contact water control is not required. However, the leachate collection and removal system will be maintained to meet state requirements.

2.3 GROUNDWATER MONITORING AND SYSTEM MAINTENANCE

Groundwater monitoring wells MW-301, MW-302, MW-303, and MW-304 will be maintained and sampled semi-annually for the parameters listed in Appendix III to Part 257 and in accordance with 40 CFR 257.90-98.

3.0 POST-CLOSURE PERIOD CONTACTS

40 CFR 257.104(d)(1)(ii). "The name, address, telephone number, and email address of the person or office to contact about the facility during the post-closure period."

The contact information for the I-43 Ash Disposal Facility during the post-closure period is as follows:

Edgewater Generating Station Attn: Plant Manager 3739 Lakeshore Drive Sheboygan, WI 53081 (920) 459-6182 CCRProgram@alliantenergy.com

4.0 POST-CLOSURE PERIOD SITE USE

40 CFR 257.104(d)(1)(iii). "A description of the planned uses of the property during the post-closure period. Post-closure use of the property shall not disturb the integrity of the final cover, liner(s), or any other component of the containment system or the function of the monitoring systems unless necessary to comply with the requirements of the subpart..."

The final use of the I-43 Ash Disposal Facility will be privately owned green space. With this use, there will be no disturbance of the final cover or any other landfill-related components.

5.0 CERTIFICATIONS

<u>40 CFR 257.104(d)(4).</u> "The owner or operator of the CCR unit must obtain a written certification from a qualified professional engineer that the initial and any amendment of the written post-closure plan meets the requirements of this section."

Eric Nelson, PE, a licensed profession engineer in the State of Wisconsin, has overseen the preparation of this Post-Closure Care Plan. A certification statement is provided on **page iii** of this plan.

6.0 RECORDKEEPING AND REPORTING

<u>40 CFR 257.104(d)(2)(iii).</u> "The owner or operator has completed the written post-closure plan when the plan including the certification required by paragraph (d)(4) of this section, has been placed in the facility's operating record as required by Section 257.105(i)(4)."

The Post-Closure Care Plan will be placed in the facility's operating record and on Alliant Energy's CCR Rule Compliance Data and Information website, as will all amendments, if any.

WPL will amend the Post-Closure Care Plan if there is a change in operation of the CCR unit that affects the written Post-Closure Care Plan or, if after post-closure activities have started, unexpected events cause a revision of the plan.

WPL will provide notification of completion of the post-closure care no later than 60 days following the completion of the post-closure care period. The notification will include certification by a qualified professional engineer verifying that post-closure care has been completed in accordance with the plan. The notification will be placed in the facility's operating record and on the website.

FIGURES

- Site Location Map Post-Closure Care Plan 2

