



Gibbons Creek Environmental Redevelopment Group, LLC

# CCR FUGITIVE DUST CONTROL PLAN

GCSES CCR UNIT CLOSURE PROJECT

Gibbons Creek Steam Electric Station

Anderson, Texas

March 3, 2021

# RECORD OF TECHNICAL PLAN AMENDMENTS, REVISIONS OR REVIEWS

Technical amendments/revisions to this Dust Control Plan should be recorded here. A P.E. certification is required whenever technical changes are made and must be included on a new certification page – See Section 2.

Date	Amendment/ Revision or Update	Summary of Changes to Plan and/or Update Observations	Pages or Sections Changed
10/19/2015	Initial	Initial Plan Issued	Entire Plan
03/03/2021	Revision 1	Updated for GCERG ownership, added figure, and best management practices pertaining to site activities	Entire Plan

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## 1.0 INTRODUCTION

The Gibbons Creek Environmental Redevelopment Group, LLC (GCERG) owns and operates the former Gibbons Creek Steam Electric Station (GCSES) facility in Anderson, TX. GCSES ceased operation as a power generation station in 2018 and subsequently no longer generates coal combustion residuals (CCR). Current site operations include the maintenance and eventual closure of five (5) identified CCR units that are subject to regulation under Title 40, Code of Federal Regulations, Part 257 (40 CFR Part 257):

- One (1) on-site landfill (Site F) and associated CCR management & Material Handling Areas
- Ash Handling Complex
- Scrubber Sludge Pond
- Former Gypsum Pile
- Ash Ponds

This document serves as the CCR Dust Control Plan (the Plan) for GCERG. The Plan is intended to satisfy the air criteria requirements of the coal combustion residual management regulations promulgated in 40 CFR Part 257.80.

This Plan requires GCERG to adopt measures that will effectively minimize CCR from becoming airborne at the facility, including CCR fugitive dust originating from CCR units, CCR piles, roads, and other CCR management activities.

#### 1.1 DUST CONTROL PLAN REQUIREMENTS AND DEFINITIONS

The coal combustion residual regulations promulgated in 40 CFR Part 257 require the preparation, certification and implementation of Dust Control Plans for all regulated CCR units. The requirement to prepare and implement this Plan is applicable to owners and operators of CCR units covered under the rule, including:

- New and existing landfills.
- New and existing surface impoundments.
- CCR units located off-site of the electric utilities' or independent power producers' facilities that receive CCR for disposal; and
- Certain inactive CCR surface impoundments if the CCR unit still contains CCR and liquids.

The Plan contains specific terms that are defined as follows in 40 CFR 257, Definitions and associated Federal Registers as noted:

Coal combustion residuals (CCR): means fly ash, bottom ash, boiler slag and flue gas
desulfurization materials generated from burning coal for the purpose of generating
electricity by electric utilities and independent power producers. <sup>1</sup>

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<sup>&</sup>lt;sup>1</sup> A description of the types of CCR can be found in the proposed rule (see 75 FR 35137).

- CCR fugitive dust means solid airborne particulate matter that contains or is derived from CCR, emitted from any source other than a stack or chimney.
- CCR landfill means an area of land or an excavation that receives CCR and which is not a surface impoundment, an underground injection well, a salt dome formation, a salt bed formation, an underground or surface coal mine, or a cave. For purposes of this subpart, a CCR landfill also includes sand and gravel pits and guarries that receive CCR, CCR piles, and any practice that does not meet the definition of a beneficial use of CCR.
- CCR pile or pile means any noncontainerized accumulation of solid, non-flowing CCR that is placed on the land. CCR that is beneficially used offsite is not a CCR pile.
- CCR surface impoundment means a natural topographic depression, manmade excavation, or diked area, which is designed to hold an accumulation of CCR and liquids, and the unit treats, stores, or disposes of CCR.
- Conditioned CCR means wetting CCR material with water to a moisture content that will prevent wind dispersal but will not result in free liquids. In lieu of water, CCR conditioning may be accomplished with an appropriate chemical dust suppression agent.
- Facility: means all contiguous land, and structures, other appurtenances, and improvements on the land, used for treating, storing, disposing, or otherwise conducting solid waste management of CCR. A facility may consist of several treatment, storage, or disposal operational units (e.g. one or more landfills, surface impoundments, or combinations of them).
- Qualified professional engineer means an individual who is licensed by a state as a Professional Engineer to practice one or more disciplines of engineering and who is qualified by education, technical knowledge and experience to make the specific technical certifications required under this subpart. Professional engineers making these certifications must be currently licensed in the state where the CCR unit(s) is located.

## 1.2 MANAGEMENT OF THE PLAN

GCERG will periodically assess the effectiveness of this Plan through the following processes and amend the plan as appropriate:

- The plant will review the visual observation records of the affected CCR units. These visual observation records may indicate cause for additional or modified dust control measures.
- Physical or procedural changes to the CCR handling processes that may change the scope or implementation of this Plan will be identified and addressed following the Plant's management of change procedure.

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A completed, certified copy of the Plan will be generated and placed in the GCERG Operating Record by March 31, 2021. GCERG will amend this Plan in accordance with the requirements of §257.80(b)(6) whenever a change that will substantially affect this written Plan, such as construction and operation of a new CCR unit. GCERG will amend this plan whenever necessary and place a copy of the current updated plan in the Operating Record in accordance with the Recordkeeping requirements of §257.105(g)(1).

An amended Plan will be certified by a qualified professional engineer as in accordance with the requirements of §257.80(b)(7).

#### 1.3 REPORTING REQUIREMENTS

GCERG will prepare an annual CCR fugitive dust report in accordance with §257.80(c) that includes the following information:

- Description of the actions taken by GCERG during the reporting year to control fugitive dust.
- A record of all citizen complaints received during the calendar year; and
- A summary of any corrective measures taken in response to received citizen complaints.

The initial Fugitive Dust Control Plan was placed in the operating record on October 19, 2015 by the previous owner TMPA. Annual reports were completed in subsequent years through when GCERG acquired the Gibbons Creek property in 2021. GCERG's first annual report will be due on October 19, 2021 and placed in the operating record as required by §257.105(g)(2).

GCERG will log and record citizen complaints of fugitive dust using the log in Appendix C.

## 1.4 NOTIFICATION REQUIREMENTS

GCERG will notify the State Director as required under §257.106(g)(1) and (2) when the following documents are made available in the Operating Record:

- The initial and subsequent amendments to this Plan; and
- The annual fugitive CCR dust control report.

According to TCEQ instructions, notifications should be sent to the TCEQ email address:

CCRNotify@tceq.texas.gov

#### 1.5 INTERNET POSTING REQUIREMENTS

GCERG will post the following documents as required under §257.107(g)(1) and (2) within 30 days of placing in the Operating Record:

- The initial and subsequent amendments to this Plan; and
- The annual fugitive CCR dust control report.

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### 1.6 COMPLIANCE WITH OTHER REGULATORY REQUIREMENTS

This Plan is designed to comply with the federal CCR dust control requirements found in 40 CFR Part 257.80 and is not intended to incorporate procedures to fully comply with the requirements of any other regulation. The facility does not intend to duplicate or deviate from the requirements for fugitive dust control required under other permits or regulations such as Texas air quality regulations under 30 TAC Part 1, Chapter 111, Control of Air Pollution from Visible emissions and Particulate Matter.

## 2.0 PROFESSIONAL ENGINEER'S CERTIFICATION

40 CFR Part 257.80(b)(7) of the dust control regulations require that the dust control plan meets the requirements of the rule. This certification is provided below:

Pursuant to 40 CFR §257.80(b)(7), I hereby certify that this amended CCR Fugitive Dust Control Plan for the Gibbons Creek Steam Electric Station meets the requirements of the Coal Combustion Residuals Rule 40 CFR §257.80(b).



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**Project Manger** 

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## 3.0 POTENTIAL SOURCES OF DUST AND CONTROL MEASURES

GCERG handles CCR in various types of units. An aerial map of the facility is included as Figure 1 in Appendix A. The former GCSES Site Map depicting the areas where CCR is managed and dust control measures are implemented:

- Ash Handling Complex (formerly known as the FGD area),
- Scrubber Sludge Pond,
- Former Gypsum ("Gyp") Pile,
- Ash Ponds,
- Site F Landfill, and
- Connecting roadways.

The regulated CCR Unit and the types of CCR material that may be managed in each unit during normal or contingent operations are presented in Table 3-1, CCR Dust Management and Control Measures.

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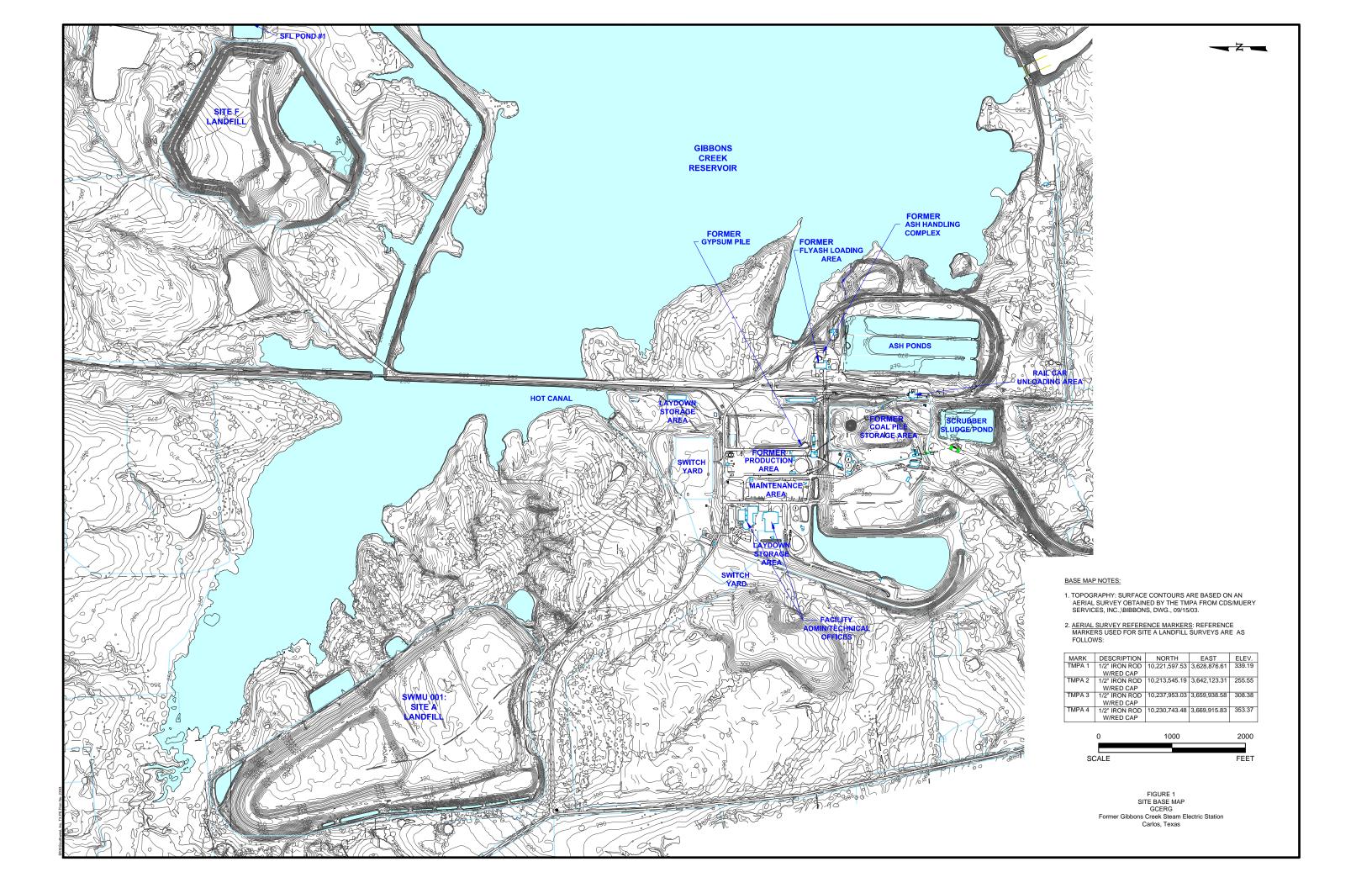
Table 3-1. CCR Dust Management and Control Measures

CCR Unit	CCR Material	Management Method	Dust Control Measure
Ash Handling Complex (formerly known as the FGD area)	Bottom ash Pyrites Fly Ash Economizer ash	<ul> <li>Management of open CCR storage area</li> <li>Discharge of wet CCR material into trucks</li> <li>Transferring wet CCR material into trucks and transporting to Site F Landfill by truck</li> </ul>	<ul> <li>Use water trucks to apply water spray, mist or fog to areas where drying has caused apparent windblown dust</li> <li>Place only wet materials in open trucks for transport throughout the site</li> <li>Manual dust suppression along roadways using water or physical removal.</li> </ul>
Scrubber Sludge Pond	Flue gas desulfurization sludge	Store and processing material in an open aqueous pond system with surrounding berm	<ul> <li>Periodic visual inspections for emission of windblown dust, maintenance of liquid cover.</li> <li>Apply water spray, mist or fog to areas where drying has caused apparent windblown dust on pond berms</li> <li>Use moisture or other conditioning agents to areas subject to drying and visible dust emissions.</li> </ul>
Gypsum Pile	Flue gas desulfurization sludge	Discharge of wet CCR material into trucks     Transferring wet CCR material into trucks     and transporting inside the plant by truck	<ul> <li>Periodic visual inspections for emission of windblown dust.</li> <li>Apply water spray, mist or fog to areas where drying has caused apparent windblown dust on pond berms</li> <li>Use moisture or other conditioning agents to areas subject to drying and visible dust emissions.</li> <li>Manual dust suppression along roadways using water or physical removal.</li> </ul>
Ash Ponds	Bottom ash Economizer ash Pyrites	Store and processing material in an open aqueous pond system with surrounding berm	<ul> <li>Periodic visual inspections for emission of windblown dust, maintenance of liquid cover.</li> <li>Apply water spray, mist or fog to areas where drying has caused apparent windblown dust</li> <li>Use moisture or other conditioning agents to areas subject to drying and visible dust emissions.</li> </ul>

Other CCR Management & Material Handling  Bottom ash Economizer ash Pyrites	<ul> <li>Storage and conveying wet material in open top trucks to open CCR storage areas or landfill disposal.</li> <li>Discharge of wet CCR material from trucks</li> <li>Discharge of dry CCR material from trucks</li> </ul>	<ul> <li>Periodic visual inspections for emission of windblown dust.</li> <li>Use water trucks to apply water spray, mist or fog to areas where drying has caused apparent windblown dust</li> <li>Place only wet materials in open trucks for transport throughout the plant</li> <li>CCR material emplaced at the landfill will be conditioned CCR</li> <li>Manual dust suppression along roadways using water or physical removal.</li> </ul>
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# APPENDIX A: FIGURE 1: GCSES SITE MAP

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# APPENDIX B: DUST CONTROL INSPECTION FORM

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# **DUST CONTROL MONITORING WORKSHEET**

Month:	Year:	
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Site Name:

	Actively v	working? 1	Weather 2,7,8	Γ	Method(s)	Used to Control Du	st <sup>3</sup>	*ls (	dust	*Is er	osion	Preventative or Corrective Action Taken	
			Temperature range, rainfall data, wind speeds,	Currently Percipitating	Water Truck Active	Alternative Cover		prese	ent? <sup>4</sup>	prese	ent? <sup>5</sup>	Examples: Added more water, applied additional alternative cover material, contacted Plant DR, etc.*	
DATE		Yes/No	dry/damp,etc.	(Y/N)	(Y/N)	Material in Place	Other	Yes	No	Yes	No	alternative cover material, contacted Plant DR, etc.*	Initials
1	AM												_
	PM												
	AM												4
	PM												
	AM												_
	PM ANA												_
	AM												+
	PM AM												_
	PM							<u> </u>					1
6	AM												1
	PM												1
	AM												
	PM							<u> </u>					
8	AM												1
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31	AM						
	PM						

6. Each

#### Notes

- 1. Actively working indicates several factors at the site.
  - YES: indicates site activity and/or equipment is operational on the day of inspection
  - NO: indicates site activity is not occurring and/or is not operational, no maintenance work or equipment movement is occurring on the day of inspection.
- 2. Weather data should be secured from the weather station that is operating at the job trailer. Take readings from the display panel just before the inspection is conducted and make a note of it for the time and date the inspection is being performed.
  - If the weather station is inoperable at the time of inspection, observed conditions should be entered with a note that the weather station was inoperable.
- 3. Indicate actual method actively being utilized for dust control and frequency if applicable. (ie: EcoUltimate in place, EcoUltimate applied in am, water truck running, rainfall sufficient for moisture, etc)
- 4. Is dust present?
  - YES: indicates that dust is visible at time of inspection. If yes is indicated, there should be preventative/corrective action noted.
  - NO: indicates that dust is not visible at the time of inspection.
- 5.ls erosion present?:
  - YES: indicates erosion (or new erosion) is present at the time of inspection. If yes is indicated, there should be preventative/corrective action noted. (existing erosion should be noted as corrective action until complete)
  - NO: indicates that no erosion is present at the time of inspection.
- date has two lines for input data. The morning inspection is to be placed in the top row for that date and the afternoon inspection results should be placed in the second.
- 7. Make sure all data placed in the inspection report above, lines up with any other daily reports you may be completing for your operations, such as erosion and sediment control inspection forms, waste acceptance forms, daily reports and/or logs, etc.

# APPENDIX C: FUGITIVE DUST CITIZEN COMPLAINT LOG

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# Citizen Complaint Log – Fugitive Dust Emissions

## **GCERG**

Former Gibbons Creek Steam Electric Station Anderson, TX

Date & Time Complaint Received	
Person Receiving Complaint	
Method Complaint	
Registered or Received	
Description of Complaint	
Area of Site Originating Complaint (if applicable)	
Corrective Action Description and Timetable (if applicable)	
Follow-Up Actions (if applicable)	