# **Section 1. Registration Information**

### Source Identification

Facility Name: Great Plains Synfuels Plant
Parent Company #1 Name: Basin Electric Power Cooperative

Submission Type: Resubmission
Receipt Date: November 2022

**Facility Identification** 

Facility ID: 1000 0010 4834

**Dun and Bradstreet Numbers (DUNS)** 

Facility DUNS: 139250161

**Facility Location Address** 

Street 1: 420 County Road 26

 Street 2:
 N/A

 City:
 Beulah

 State:
 ND

 ZIP:
 58523

 ZIP4:
 9400

 County:
 Mercer

Facility Latitude and Longitude

Latitude (decimal): 47.358
Longitude (decimal): -101.838

Local Emergency Planning Committee and Regulations

LEPC: Mercer County LEPC

OSHA PSM: Yes
EPCRA 302: Yes
CAA Title V: Yes

### **Process Chemicals**

Program Level: Program Level 1 process

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Program Level: Program Level 3 process Chemical Name: Ammonia (anhydrous)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Program Level: Program Level 3 process

Chemical Name: Chlorine
CAS Number: 7782-50-5
Flammable/Toxic: Toxic

Program Level: Program Level 3 process
Chemical Name: Ammonia (anhydrous)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Program Level: Program Level 3 process
Chemical Name: Ammonia (anhydrous)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Program Level: Program Level 3 process
Chemical Name: Ammonia (anhydrous)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Program Level: Program Level 3 process
Chemical Name: Ammonia (conc 20% or greater)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

Facility Name: Great Plains Synfuels Plant EPA Facility Identifier: 1000 0010 4834

Plan Sequence Number: 1000103069

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

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Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

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Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

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CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 3 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

Facility Name: Great Plains Synfuels Plant EPA Facility Identifier: 1000 0010 4834

Plan Sequence Number: 1000103069

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 3 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

Program Level: Program Level 1 process
Chemical Name: Flammable Mixture

CAS Number: 00-11-11 Flammable/Toxic: Flammable

### Flammable Mixture Chemical Components

Chemical Name: Methane
CAS Number: 74-82-8
Flammable/Toxic: Flammable

Chemical Name: Hydrogen
CAS Number: 1333-74-0
Flammable/Toxic: Flammable

### **Process NAICS**

NAICS Code: 22121

NAICS Description: Natural Gas Distribution

NAICS Code: 325311

NAICS Description: Nitrogenous Fertilizer Manufacturing

## **Section 6. Accident History**

## Accident History ID: Accident 1

Date of Accident: November 2019

Time Accident Began (HH:MM): 20:25
NAICS Code of Process Involved: 22121

NAICS Description:

Release Duration:

Natural Gas Distribution

000 Hours 01 Minutes

### Release Event

Gas Release: Yes
Liquid Spill/Evaporation: N/A
Fire: N/A
Explosion: N/A
Uncontrolled/Runaway Reaction: N/A

### Release Source

Storage Vessel: N/A Piping: N/A Process Vessel: N/A Transfer Hose: N/A Valve: N/A Pump: N/A Joint: N/A Other Release Source: Tubing

## Weather Conditions at the Time of Event

Wind Speed: 14.0
Units: Miles/h
Direction: N
Temperature: 28
Atmospheric Stability Class: D
Precipitation Present: N/A
Unknown Weather Conditions: N/A

Employee or Contractor Deaths:

Public Responder Deaths:

O
Public Deaths:

Employee or Contractor Injuries:

Public Responder Injuries:

O
Public Injuries:

O
On-Site Property Damage (\$):

**Known Off-Site Impacts** 

Deaths: 0
Hospitalizations: 0
Public Deaths: 0
Other Medical Treatments: 0
Evacuated: 0
Sheltered-in-Place: 0
Off-Site Property Damage (\$): 0

**Environmental Damage** 

Fish or Animal Kills:

Tree, Lawn, Shrub, or Crop Damage:

N/A

Water Contamination:

N/A

Soil Contamination:

N/A

Other Environmental Damage:

N/A

**Initiating Event** 

Initiating Event:

Human Error

### **Contributing Factors**

**Equipment Failure:** N/A Human Error: Yes Improper Procedures: N/A N/A Overpressurization: **Upset Condition:** N/A By-Pass Condition: N/A Maintenance Activity/Inactivity: N/A Process Design Failure: N/A Unsuitable Equipment: N/A **Unusual Weather Condition:** N/A Management Error: N/A Other Contributing Factor: N/A

## Off-Site Responders Notified

Off-Site Responders Notified: No, not notified

## Changes Introduced as a Result of the Accident

Improved or Upgraded Equipment: N/A N/A Revised Maintenance: Revised Training: N/A **Revised Operating Procedures:** N/A New Process Controls: N/A New Mitigation Systems: N/A Revised Emergency Response Plan: N/A **Changed Process:** N/A Reduced Inventory: N/A Yes None: Other Changes Introduced: N/A

## Chemicals in Accident History

Quantity Released (lbs): 1
Percent Weight: 99.5

Chemical Name: Ammonia (anhydrous)

CAS Number: 7664-41-7 Flammable/Toxic: Toxic

Facility Name: Great Plains Synfuels Plant EPA Facility Identifier: 1000 0010 4834

Plan Sequence Number: 1000103069

## **Section 9. Emergency Response**

## Written Emergency Response (ER) Plan

Community Plan (Is facility included in written community emergency response plan?):

Yes

Facility Plan (Does facility have its own written emergency response plan?):

Yes

Response Actions (Does ER plan include specific actions to be taken in response to accidental releases of regulated substance(s)?):

Yes

Public Information (Does ER plan include procedures for informing the public and local agencies responding to accidental release?):

Yes

Healthcare (Does facility's ER plan include information on emergency

Yes

health care?):

## **Local Agency**

Agency Name (Name of local agency with which the facility ER plan or response activities are coordinated):

Mercer Co. Disaster Em. Services

Agency Phone Number (Phone number of local agency with which the facility ER plan or response activities are coordinated):

(701) 745-3333