# Iowa Department of Natural Resources Draft Title V Operating Permit

Name of Permitted Facility: Cargill Inc. – Sioux City Facility Location: 1016 Clark Street, Sioux City, IA 51101 Air Quality Operating Permit Number: 99-TV-013R5

**Expiration Date:** \*\*DATE\*\*

Permit Renewal Application Deadline: \*\*DATE\*\*

**EIQ Number: 92-0769** 

Facility File Number: 97-01-001

# **Responsible Official**

Name: Christopher Osborn Title: Facility Leader

Mailing Address: 1016 Clark St, Sioux City, IA 51101

Phone #: (712)279-1234

# **Permit Contact Person for the Facility**

Name: Christopher Osborn

**Title: Facility Leader** 

Mailing Address: 1016 Clark St, Sioux City, IA 51101

Phone #: (712)279-1234

This permit is issued in accordance with 567 Iowa Administrative Code Chapter 22, and is issued subject to the terms and conditions contained in this permit.

# For the Director of the Department of Natural Resources

Marnie Stein, Supervisor of Air Operating Permits Section Date

# **Table of Contents**

I.	Facility Description and Equipment List5
II.	Plant - Wide Conditions8
III.	Emission Point Specific Conditions12
	General Conditions
	G1.Duty to Comply
	G2.Permit Expiration
	G3. Certification Requirement for Title V Related Documents
	G4. Annual Compliance Certification
	G5.Semi-Annual Monitoring Report
	G6. Annual Fee
	G7.Inspection of Premises, Records, Equipment, Methods and Discharges
	G8. Duty to Provide Information
	G9.General Maintenance and Repair Duties
	G10. Recordkeeping Requirements for Compliance Monitoring
	G11. Evidence used in establishing that a violation has or is occurring.
	G12. Prevention of Accidental Release: Risk Management Plan Notification and Compliance
	Certification
	G13. Hazardous Release
	G14. Excess Emissions and Excess Emissions Reporting Requirements
	G15. Permit Deviation Reporting Requirements
	G16. Notification Requirements for Sources That Become Subject to NSPS and NESHAP
	Regulations
	G17. Requirements for Making Changes to Emission Sources That Do Not Require Title V
	Permit Modification
	G18. Duty to Modify a Title V Permit
	G19. Duty to Obtain Construction Permits
	G20. Asbestos
	G21. Open Burning
	G22. Acid Rain (Title IV) Emissions Allowances
	G23. Stratospheric Ozone and Climate Protection (Title VI) Requirements
	G24. Permit Reopenings G25. Permit Shield
	G26. Severability
	G27. Property Rights
	G28. Transferability
	G29. Disclaimer
	G30. Notification and Reporting Requirements for Stack Tests or Monitor Certification
	G31. Prevention of Air Pollution Emergency Episodes
	G32. Contacts List
V.	Appendix A Links to Standards:
V.	Appendix B: Executive Order EO-10 Rules Crosswalk

# **Abbreviations**

acfm	actual cubic feet per minute
CFR	Code of Federal Regulation
CE	control equipment
CEM	continuous emission monitor
°F	degrees Fahrenheit
EIQ	emissions inventory questionnaire
EP	emission point
EU	
gr./dscf	grains per dry standard cubic foot
IAC	Iowa Administrative Code
DNR	Iowa Department of Natural Resources
MVAC	motor vehicle air conditioner
NAICS	North American Industry Classification System
NSPS	new source performance standard
NESHAP	National Emission Standards for Hazardous Air Pollutants
ppmv	parts per million by volume
lb./hr	pounds per hour
	pounds per million British thermal units
SCC	Source Classification Codes
scfm	standard cubic feet per minute
SIC	Standard Industrial Classification
TPY	tons per year
USEPA	United States Environmental Protection Agency
<b>Pollutants</b>	
	particulate matter
	particulate matter ten microns or less in diameter
	sulfur dioxide
	nitrogen oxides
	volatile organic compound
	carbon monoxide
HAP	hazardous air pollutant

# I. Facility Description and Equipment List

Facility Name: Cargill Inc. - Sioux City

Permit Number: 99-TV-013R5

Facility Description: Soybean Processing Plant

Principal Activities: Soybean Oil Processing and Refining (SIC 2075)

Secondary Activities: Refining Soybean Oil (SIC 2079), Refining Vegetable Oil (SIC 2076)

Emission Point	Emission Unit	Emission Unit Description	Construction Permit Number
EP-01	EU-01.01	Conveyance	95-A-323-P13
EP-01	EU-01.02	West Grain Cleaner	93-A-323-P13
EP-01A	EU-01.03	Grinder	13-A-188-P
	EU-02	Tank 82	
EP-02	EU-02.01	Conveyors	95-A-324-P11
EP-02	EU-02.02	Four (4) Primary Crackers	93-A-324-P11
	EU-02.03	Vertical Seed Conditioner	
EP-04	EU-04.01	Hull Grinding	95-A-325-S5
	EU-05.01	Drying	
EP-05	EU-05.02	Cooling	95-A-326-S4
	EU-05.03	Conveying	
EP-05A	EU-05A.01	Meal Dryer/Cooler Deck #1	98-A-400-S2
	EU-06.01	Meal Grinders	
EP-06	EU-06.02	Drag Conveyor	95-A-327-P6
	EU-06.03	Sifters	
	EU-07.02	Meal Sifter	
	EU-07.03	Meal Grinder	
EP-08	EU-08.01	Rail Loadout	95-A-329-P7
	EU-08.02	Truck Loadout	
	EU-08.03	Conveyance	
EP-09	EU-09.01	Clay Storage	95-A-330
EP-10	EU-10.01	Clay Handling	95-A-331
ED 11	EU-11.01	Conveying	05 4 222 55
EP-11	EU-11.02	East Grain Cleaner	95-A-332-S5
EP-13	EU-13.01	Flakers	95-A-334-P8
EP-13	EU-13.02	Conveyors	93-A-334-P8
ED 12 A	EU-13A.01	Flaking	09 A 401 D4
EP-13A	EU-13A.02	Conveyors	98-A-401-P4
EP-15	EU-15.01	Hull Transfer Storage	95-A-336-S4
EP-16	EU-16.01	Extraction Process	95-A-337-P9
EP-17	EU-17.01	Package Boiler	86-A-036-S6
EP-20	EU-20.01	Pellet Transfer	98-A-402-S3
EP-21	EU-21.01	1 Drying O.S.A.	
EF-21	EU-21.02	In Process Natural Gas Usage	95-A-340-S4

Emission Point	Emission Unit	Emission Unit Description	Construction Permit Number
EP-22	EU-22.01	Drying	98-A-403-S3
EF-22	EU-22.02	In Process Natural Gas Usage	90-A-403-33
	EU-23.01	Reconditioned Boiler #3- Natural Gas	
EP-23	EU-23.02	Reconditioned Boiler #3- Fuel Oil	95-A-341-S7
	EU-23.03	Reconditioned Boiler #3- Vegetable Oil	
	EU-23.21	Boiler #3 Heat Recovery Stack - Natural Gas	
EP-23.2	EU-23.22	Boiler #3 Heat Recovery Stack - Fuel Oil	07-A-989-S1
	EU-23.23	Boiler #3 Heat Recovery Stack - Vegetable Oil	
EP-25	EU-25.01	Storage Tank	94-A-507
ED 26	EU-26.01	Bean Truck Receiving II (Receiving Pit)	06 A 1052 D7
EP-26 EU-26.02		Bean Truck Receiving II (Conveyance)	96-A-1253-P7
EP-27	EU-27.01	Bean Conditioner	98-A-404-P4
EP-28	EU-28.01	Pellet Cooler	98-A-405-P5
EP-29	EU-29.01	GTX Refinery Boiler	99-A-677
EP-30 EU-30		Meal Flow Additive Tank	02-A-282-S1
EP-32 EU-32		Soybean CoProduct L/O System	02-A-555-S1
EP-33 EU-33 Vegetable Oil Refinery		Vegetable Oil Refinery	03-A-028-S1
		Dehulling Process	18-A-167

# **Insignificant Activities Equipment List**

Insignificant Emission Unit Number	Insignificant Emission Unit Description
SS#3	Soybean Storage Tank
SS#4	Meal Storage Tank
SS#7	Finished Meal Leg

# **II. Plant-Wide Conditions**

Facility Name: Cargill Inc. – Sioux City

Permit Number: 99-TV-013R5

Permit conditions are established in accord with 567 Iowa Administrative Code rule 24.108. When 567 IAC as amended May 15, 2024, and cited in this permit becomes State Implementation Plan (SIP) approved, it will supersede 567 IAC as amended February 8, 2023. Prior to May 15, 2024, all Title V rule citations in this Title V permit were found and cited in 567 IAC Chapter 22. During the period from May 15, 2024, to the date that 567 IAC as amended May 15, 2024, is approved into the SIP, both 567 IAC as amended May 15, 2024 and 567 IAC as amended February 8, 2023 form the legal basis for the applicable requirements included in this permit. A crosswalk showing the citation changes is attached to this permit in Appendix B.

#### **Permit Duration**

The term of this permit is: Five years from permit issuance

Commencing on: \*\*DATE\*\*

Ending on: \*\*DATE\*\*

Amendments, modifications and reopenings of the permit shall be obtained in accordance with 567 Iowa Administrative Code rules 24.110 - 24.114. Permits may be suspended, terminated, or revoked as specified in 567 Iowa Administrative Code Rules 24.115.

# **Emission Limits**

Unless specified otherwise in the Source Specific Conditions, the following limitations and supporting regulations apply to all emission points at this plant:

Opacity (visible emissions): 40% opacity

Authority for Requirement: 567 IAC 23.3(2)"d"

<u>Sulfur Dioxide (SO<sub>2</sub>):</u> 500 parts per million by volume

Authority for Requirement: 567 IAC 23.3(3)"e"

#### Particulate Matter:

No person shall cause or allow the emission of particulate matter from any source in excess of the emission standards specified in this chapter, except as provided in 567 – Chapter 24. For sources constructed, modified or reconstructed on or after July 21, 1999, the emission of particulate matter from any process shall not exceed an emission standard of 0.1 grain per dry standard cubic foot of exhaust gas, except as provided in 567 – 21.2(455B), 23.1(455B), 23.4(455B) and 567 – Chapter 24.

For sources constructed, modified or reconstructed prior to July 21, 1999, the emission of particulate matter from any process shall not exceed the amount determined from the equation provided in 23.3(2)"a"(2) or amount specified in a permit if based on an emission standard of 0.1

grain per standard cubic foot of exhaust gas or established from standards provided in 23.1(455B) and 23.4(455B).

Authority for Requirement: 567 IAC 23.3(2)"a"

<u>Fugitive Dust:</u> Attainment and Unclassified Areas - A person shall take reasonable precautions to prevent particulate matter from becoming airborne in quantities sufficient to cause a nuisance as defined in Iowa Code section 657.1 when the person allows, causes or permits any materials to be handled, transported or stored or a building, its appurtenances or a construction haul road to be used, constructed, altered, repaired or demolished, with the exception of farming operations or dust generated by ordinary travel on unpaved roads. Ordinary travel includes routine traffic and road maintenance activities such as scarifying, compacting, transporting road maintenance surfacing material, and scraping of the unpaved public road surface. (the preceding sentence is State Only) All persons, with the above exceptions, shall take reasonable precautions to prevent the discharge of visible emissions of fugitive dusts beyond the lot line of the property on which the emissions originate. The public highway authority shall be responsible for taking corrective action in those cases where said authority has received complaints of or has actual knowledge of dust conditions which require abatement pursuant to this subrule. Reasonable precautions may include, but not be limited to, the following procedures.

- 1. Use, where practical, of water or chemicals for control of dusts in the demolition of existing buildings or structures, construction operations, the grading of roads or the clearing of land.
- 2. Application of suitable materials, such as but not limited to asphalt, oil, water or chemicals on unpaved roads, material stockpiles, race tracks and other surfaces which can give rise to airborne dusts.
- 3. Installation and use of containment or control equipment, to enclose or otherwise limit the emissions resulting from the handling and transfer of dusty materials, such as but not limited to grain, fertilizer or limestone.
- 4. Covering, at all times when in motion, open-bodied vehicles transporting materials likely to give rise to airborne dusts.
- 5. Prompt removal of earth or other material from paved streets or to which earth or other material has been transported by trucking or earth-moving equipment, erosion by water or other means.
- 6. Reducing the speed of vehicles traveling over on-property surfaces as necessary to minimize the generation of airborne dusts.

Authority for Requirement: 567 IAC 23.3(2)"c"

# **40 CFR Part 60 Subpart A – General Provisions**

This facility is subject to 40 CFR 60 Subpart A – General Provisions. The affected emission points include EP-01, EP-02, EP-11, EP-16, EP-17, EP-21, EP-22, EP-23, EP-23.2, EP-26 and EP-29. See Appendix A for the link to the Standard.

Authority for Requirements: 40 CFR 60 Subpart A

567 IAC 23.1(2)

# 40 CFR Part 60 Subpart Db Requirements

This facility is subject to 40 CFR Part 60 Subpart Db – Standards of Performance for Industrial, Commercial, Institutional Steam Generating Units. The affected emission points include EP-23 and EP-23.2. See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 60 Subpart Db

567 IAC 23.1(2) "ccc"

# **40 CFR Part 60 Subpart Dc Requirements**

This facility is subject to 40 CFR Part 60 Subpart Dc – Standards of Performance for Small Industrial, Commercial, and Institutional Steam Generating Unit. The affected emission points includes EP-17 and EP-29. See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 60 Subpart Dc

567 IAC 23.1(2) "III"

# **40 CFR 60 Subpart DD Requirements**

This facility is subject to 40 CFR 60 Subpart DD – Standards of Performance for Grain Elevators. The affected emission points include EP-01, EP-02, EP-11, EP-21, EP-22 and EP-26. See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 60 Subpart DD

567 IAC 23.1(2) "ooo"

#### 40 CFR Part 63 Subpart A Requirements

This facility is subject to 40 CFR Part 63 Subpart A – General Provisions. The affected emission points include EP-16, EP-17, EP-23, EP-23.2 and EP-29.

See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 63 Subpart A

567 IAC 23.1(4) "a"

# **40 CFR Part 63 Subpart GGGG Requirements**

This facility is subject to 40 CFR Part 63 Subpart GGGG – National Emission Standard for Hazardous Air Pollutants: Solvent Extractions for Vegetable Oil Production. The affected emission point includes EP-16.

See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 63 Subpart GGGG

# 567 IAC 23.1(4) "cg"

# **40 CFR Part 63 Subpart DDDDD Requirements**

This facility is subject to 40 CFR Part 63 Subpart DDDDD - National Emission Standards for Hazardous Air Pollutants for Major Sources: Industrial, Commercial, and Institutional Boilers and Process Heaters. The affected emission points include EP-17, EP-23, EP-23.2 and EP-29. See Appendix A for the link to the Standard.

Applicable requirements are incorporated in the Emission Point Specific conditions.

Authority for Requirements: 40 CFR 63 Subpart DDDDD

# **40 CFR Part 61 Subpart M Requirements**

This facility is subject only to the Subpart M NESHAP for the demolition and renovation of asbestos containing structures identified in 40 CFR 61.145.

See Appendix A for the link to the Standard.

Authority for Requirements: 40 CFR 61 Subpart M

567 IAC 23.1(3)"a"

# **III. Emission Point-Specific Conditions**

Facility Name: Cargill Inc. – Sioux City

Permit Number: 99-TV-013R5

# **Emission Point ID Number: EP-01**

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-1.01	Conveyance (EU 1.01)  • West Clean Leg Head and Boot  • West Dry Leg Head and Boot  • Tempering Tank Feed Drag  Overhead Tram Drag Conveyor Head	CE-01: Cartridge Filter	Soybeans	8,100 bu/hr	95-A-323-P13
EU-1.02	West Grain Cleaner			8,100 bu/hr	

Note: The maximum annual capacity for this facility is 1,916,250 tons of soybeans per year.

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DND Construction Domnit 05 A 222 D12
Particulate Matter (PM <sub>10</sub> )	0.0039 gr/dscf, 0.60 lb/hr (1)	DNR Construction Permit 95-A-323-P13,
Particulate Matter (PM)	0.0046 gr/dscf, 0.72 lb/hr (1)	567 IAC 23.3(2)"d"

<sup>(1)</sup> Total combined emissions allowed for EPs 01 and 01A.

#### **Other Emission Limits**

Pollutant	Limit	Reference
Opacity	40% (2)	DNR Construction Permit 95-
Particulate Matter (PM <sub>2.5</sub> )	0.29 lb/hr	A-323- P13,
Particulate Matter (PM <sub>10</sub> )	0.59 lb/hr	40 CFR 60 Subpart DD,
Particulate Matter (PM) - State	0.72 lb/hr	567 IAC 23.1(2)"000"
Particulate Matter (PM) - Federal	0.023 g/dscfm (3)	567 IAC 23.3(2)"d"

<sup>(2)</sup> An exceedance of the indicator opacity of "No Visible Emissions" will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

 $<sup>^{(3)}</sup>$  0.023 grams per dry standard cubic meter (g/dscm) = 0.01 grains per dry standard cubic foot (gr/dscf).

**NSPS** Applicability

EU ID	Subpart	Title	Туре	State Reference (567 IAC)	Federal Reference (40 CFR)
1.01,	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
1.01,	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

## **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The owner or operator shall maintain the Cartridge Filter (CE-01) according to the manufacturer's specifications and maintenance schedule or per a written facility-specific operation and maintenance plan. The owner or operator shall maintain a log of all inspections and maintenance of the Cartridge Filter (CE-01). The owner or operator shall maintain a log of all actions resulting from the inspections and maintenance of the Cartridge Filter (CE-01).
- B. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 19-057 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 19-057,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 19-057, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- C. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- D. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 19-057.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- E. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition D for a period of ten (10) years after the project 19-057 is completed.
- F. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 95-A-323-P13

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 40.5

Stack Opening, (inches, dia.): 22 Exhaust Flow Rate (scfm): 21,000 Exhaust Temperature (°F): 70

Discharge Style: Vertical Unobstructed

Authority for Requirement: DNR Construction Permit 95-A-323-P13

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes No No
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-01A**

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-1.03	Grinder	CE-01A: Bag Filter	Soybeans	4 tons/hr	13-A-188-P

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.0039 gr/dscf, 0.60 lb/hr (1)	13-A-188-P,
Particulate Matter (PM)	0.0046 gr/dscf, 0.72 lb/hr <sup>(1)</sup>	567 IAC 23.3(2)"d"

<sup>(1)</sup>Total combined emissions allowed for EPs 1 and 1A

# **Other Emission Limits**

Pollutant	Limit	Reference
Particulate Matter (PM <sub>2.5</sub> )	0.13 lb/hr	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.13 lb/hr	13-A-188-P,
Particulate Matter (PM)	0.13 lb/hr, 0.1 gr/dscf	567 IAC 23.4 (7)

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The owner or operator shall maintain the control equipment according to manufacturer's specifications and maintenance schedule or per a written facility specific operation and maintenance plan.
- B. A log of all inspections and maintenance of the control equipment.
- C. A log of all actions resulting from the inspections and maintenance of the control equipment.

Authority for Requirement: DNR Construction Permit 13-A-188-P

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 20 Stack Opening, (inches, dia.): 12

Exhaust Flow Rate (scfm): 3,000 Exhaust Temperature (°F): 70

Discharge Style: Vertical Unobstructed

Authority for Requirement: DNR Construction Permit 13-A-188-P

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-02**

# **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-02	Tank 82			218.75 ton/hr	
EU-02.01	Conveyors			218.75 ton/hr	
EU-02.02	Four (4) Primary Crackers	CE-02: Baghouse	Soybeans	57,000 bu/day each	95-A-324-P11
EU-02.03	Vertical Seed Conditioner			218.75 ton/hr	

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Particulate Matter (PM <sub>10</sub> )	0.003 gr/dscf, 0.76 lb/hr	DNR Construction Permit
Particulate Matter (PM)	0.006 gr/dscf, 1.52 lb/hr	95-A-324-P11

#### **Other Emission Limits**

Pollutant	Limit	Reference	
Opegity	0% (1)	DNR Construction Permit 95-A-324-P11,	
Opacity	0%	40 CFR 60 Subpart DD, 567 IAC 23.1(2)"000"	
Particulate Matter (PM <sub>2.5</sub> )	0.38 lb/hr	DNR Construction Permit 95-A-324-P11	

<sup>(1)</sup> An exceedance of the indicator opacity of "No Visible Emissions" will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

# **NSPS** Applicability

EU ID	Subpart	Title	Туре	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
2.01	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

A. The emission units (EU 02, 02.01, 02.02) and control equipment (CE-02) shall be operated and maintained according to the facility's maintenance schedule.

- B. A log of all maintenance and inspection activities performed on the emission units (EU 02, 02.01, 02.02) and control equipment (CE-02). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission units (EU 02, 02.01, 02.02) and/or control equipment (CE-02);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- C. The facility shall process a maximum of 1,916,250 tons of soybeans per twelve month rolling total.
- D. The owner or operator shall record the total amount of soybeans processed, in tons for each month.
- E. The owner or operator shall record the total amount of soybeans processed, in tons per twelve month period rolled monthly.
- F. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- H. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- I. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition H for a period of ten (10) years after the project 18-101 is completed.
- J. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- K. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 19-057 the owner or operator shall document and maintain a record of the following:
  - a. A description of project 19-057,

- b. Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 19-057, and
- c. A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- L. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- M. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - a. Monitor the emission of PM,  $PM_{10}$  and  $PM_{2.5}$  that is emitted by any emissions unit affected by project 19-057.
  - b. Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- N. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition M for a period of ten (10) years after the project 19-057 is completed.
- O. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 95-A-324-P11

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 62

Stack Opening, (inches, dia.): 26 Exhaust Flow Rate (scfm): 29,500 Exhaust Temperature (°F): 70

Discharge Style: Vertical Unobstructed

Authority for Requirement: DNR Construction Permit 95-A-324-P11

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
An Agency O&M plan is located below for baghouse CE-02	
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂
Authority for Requirement: 567 IAC 24.108(3)	

# Cargill Inc. – Sioux City, IA Baghouse Agency Operation & Maintenance Plan (EPs 2 and 11)

#### Monitoring Guidelines

The facility makes a commitment to take timely corrective action during periods of excursion where the indicators are out of range. A corrective action may include an investigation of the reason for the excursion, evaluation of the situation and necessary follow-up action to return operation within the indicator range. An excursion is determined by the averaged discrete data point over a period of time, or the presence of a monitored abnormal condition. An excursion does not necessarily indicate a violation of an applicable requirement. If the corrective action measures fail to return the indicators to the appropriate range, the facility will report the excursion to the department and conduct source testing within 90 days of the excursion to demonstrate compliance with the applicable requirements. If the test

demonstrates compliance with emission limits then new indicator ranges must be set for monitoring and the new ranges must be incorporated in the operating permit. If the test demonstrates noncompliance with emission limits, then the facility, within 60 days, proposes a schedule to implement corrective action to bring the source into compliance and demonstrate compliance.

# Monitoring Methods and Corrective Actions

## Weekly

- Visible emissions shall be observed on a weekly basis to ensure no visible emissions occur during the material handling operation of the unit. If visible emissions are observed this would be an excursion not a violation, and corrective action will be taken as soon as possible, but no later than 8 hours. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake readings at approximately 2 hour intervals throughout the day. If unsuccessful that day due to weather, an observation shall be made the following day.
- External inspection of baghouse components and area around baghouse for evidence of leaks, plugging and/or improperly working equipment.

# Every 12 - 18 Months

- During each welding shutdown, a thorough inspection of the bags for leaks and wear.
   If leaks or abnormal conditions are detected the appropriate measures for remediation will be initiated and documented. Bag replacement should be documented by identifying the date and number of bags replaced. If the timeframe between welding shutdowns exceeds 18 months, inspections will be scheduled on the next planned down day.
- Inspect all components that are not subject to wear or plugging, including structural components, housing, ducts and hoods. If leaks or abnormal conditions are detected the appropriate measures for remediation will be initiated before the system is returned to service.
- Maintain a written record of the inspection and any action resulting from the inspection.

# Recordkeeping

• Inspection records and record of any resulting corrective actions will be kept on-site for a minimum of five (5) years and made available upon request.

#### **Ouality Control**

• All instruments and control equipment will be calibrated, maintained, and operated according to good air pollution control practices.

# **Emission Point ID Number: EP-04**

# Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-4.01	Hull Grinding	CE-04: Bag filter	Soybeans	1,642,500 ton/yr	95-A-325-S5

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DND Construction Domnit 05 A 225 S5
Particulate Matter (PM <sub>10</sub> )	0.002 gr/dscf, 0.137 lb/hr	DNR Construction Permit 95-A-325-S5,
Particulate Matter (PM)	0.006 gr/dscf	567 IAC 23.3(2)"d"

#### **Other Emission Limits**

Pollutant	Limit	Reference	
Particulate Matter (PM)	0.1 gr/dscf	DNR Construction Permit 95-A-325-S5, 567 IAC 23.4(7)	

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 36.6

Stack Opening, (feet, dia.): 1.67 Exhaust Flow Rate (acfm): 8,000 Exhaust Temperature (°F): Ambient

Authority for Requirement: DNR Construction Permit 95-A-325-S5

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

## **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes No No
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🗵

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-05**

# **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-5.01	Drying	CE-5.01, CE-5.02,		1,642,500 tons/yr	
EU-5.02	Cooling	CE-5.03, CE-5.04: 4 Product	Soybeans	1,642,500 tons/yr	95-A-326-S4
EU-5.03	Conveying	Recovery Cyclones	Boybeans	1,642,500 tons/yr	75 11 520°GT

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.005 gr/dscf, 2.9 lb/hr	95-A-326-S4,
Particulate Matter (PM)	0.01gr/dscf, 5.8 lb/hr	567 IAC 23.3(2)"d"

#### **Other Emission Limits**

Pollutant	Limit	Reference	
Particulate Matter (PM)	0.1 gr/dscf	DNR Construction Permit 95-A-326-S4, 567 IAC 23.4(7)	

# **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

## **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 85 Stack Opening, (inches, dia.): 66 Exhaust Flow Rate (acfm): 72,800

Exhaust Tow Rate (actin). 72,8 Exhaust Temperature (°F): 115

Authority for Requirement: DNR Construction Permit 95-A-326-S4

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

## **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-05A**

Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-05A.01	Meal Dryer/Cooler Deck #1	CE-05A: Product Recovery Cyclone	Soybeans	1,642,500 ton/yr	98-A-400-S2

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DND Construction Domnit 00 A 400 C2
Particulate Matter (PM <sub>10</sub> )	0.003 gr/dscf, 0.6 lb/hr	DNR Construction Permit 98-A-400-S2,
Particulate Matter (PM)	0.006gr/dscf, 1.2 lb/hr	567 IAC 23.3(2)"d"

#### **Other Emission Limits**

Pollutant	Limit	Reference
Particulate Matter (PM)	0.1 gr/dscf	DNR Construction Permit 98-A-400-S2, 567 IAC 23.4(7)

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

# **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 71 Stack Opening, (inches, dia.): 30.5 Exhaust Flow Rate (acfm): 27,500 Exhaust Temperature (°F): 190

Authority for Requirement: DNR Construction Permit 98-A-400-S2

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

## **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🔀
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes ☐ No ⊠

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-06**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-06.01	Meal Grinders	GE 06		218.75 ton/hr	
EU-06.02	Drag Conveyors	CE-06: Baghouse	Soybeans	218.75 ton/hr	95-A-327-P6
EU-06.03	Sifters	Dagnouse		218.75 ton/hr	

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit 95-
Particulate Matter (PM <sub>10</sub> )	0.002 gr/dscf; 0.24 lb/hr	A-327-P6,
Particulate Matter (PM)	0.006 gr/dscf	567 IAC 23.3(2)"d"

#### **Other Emission Limits**

Pollutant	Limits	Reference
Omogity	40% (1)	DNR Construction Permit 95-A-327-P6,
Opacity	40%	567 IAC 23.3(2) "d"
Particulate Matter (PM <sub>10</sub> )	0.24 lb/hr	DNR Construction Permit 95-A-327-P6
Posticulate Matter (DM)	0.1 cm/cof	DNR Construction Permit 95-A-327-P6,
Particulate Matter (PM)	0.1 gr/scf	567 IAC 23.4(7)

<sup>(1)</sup> An exceedance of the indicator opacity of no visible emissions will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The emission units (EU 6.01, 6.02, 6.03) and control equipment (CE-06) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the emission units (EU 6.01, 6.02, 6.03) and control equipment (CE-06). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission units (EU (EU 6.01, 6.02, 6.03) and/or control equipment (CE-06);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- C. The facility shall process a maximum of 1,916,250 tons of soybeans per twelve month

- rolling total.
- D. The owner or operator shall record the total amount of soybeans processed, in tons for each month.
- E. The owner or operator shall record the total amount of soybeans processed, in tons per twelve month period rolled monthly.
- F. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- H. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- I. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition H for a period of ten (10) years after the project 18-101 is completed.
- J. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 95-A-327-P6

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 54 Stack Opening, (inches, dia.): 30

Exhaust Flow Rate (scfm): 14,000 Exhaust Temperature (°F): Ambient Discharge Style: Vertical, unobstructed

Authority for Requirement: DNR Construction Permit 95-A-327-P6

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Emission Point ID Number: EP-08**

# **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-07.02	Meal Sifter	Equipment	Material	375 tons/hr	Terme
EU-07.03	Meal Grinder	GE 00	Soybean	375 tons/hr	
EU-08.01	Rail Loadout	CE-08: Baghouse	meal and	400 tons/hr	95-A-329-P7
EU-08.02	Truck Loadout		hulls	400 tons/hr	
EU-08.03	Conveyance			400 tons/hr	

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0% (1)	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.0021 gr/dscf, 0.5 lb/hr	95-A-329-P7,
Particulate Matter (PM)	0.0042 gr/dscf, 1.0 lb/hr	567 IAC 23.3(2)"d"

<sup>(1)</sup> An exceedance of the indicator opacity of "No Visible Emissions" will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

## **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The Baghouse (CE-08) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the Baghouse (CE-08). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the Baghouse (CE-08);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- C. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and

- (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- D. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- E. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- F. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition E for a period of ten (10) years after the project 18-101 is completed.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- H. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 19-057 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 19-057,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 19-057, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- I. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- J. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 19-057.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- K. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition J for a period of ten (10) years after the project

19-057 is completed.

L. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 95-A-329-P7

# **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 120

Stack Opening, (inches, dia.): 30 Exhaust Flow Rate (scfm): 35,000 Exhaust Temperature (°F): 70

Discharge Style: Vertical, Unobstructed

Authority for Requirement: DNR Construction Permit 95-A-329-P7

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

### **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-9.01	Clay Storage	CE-09: Fabric filter	Filter Aid	15 tons/hr	95-A-330

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Posticulate Metter (DM )	0.005 gr/dscf, 0.034 lb/hr,	95-A-330,
Particulate Matter (PM <sub>10</sub> )	0.15 tons/year	567 IAC 23.3(2)"a",
Particulate Matter (PM)	0.1 gr/dscf	567 IAC 23.3(2)"d"

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

A. The stack exhaust shall be observed once per week and the presence/lack of a visible plume noted. If visible emissions are noted, the baghouse shall be inspected and necessary repairs completed within 24 hours of the observation. If, after 24 hours repairs have not been completed, the source shall be shutdown until they have been completed. The Department shall be notified of the exceedance and completion of the repairs within 24 hours of each respectively.

Authority for Requirement: DNR Construction Permit 95-A-330

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 45.3

Stack Opening, (inches, dia.): 8 Exhaust Flow Rate (acfm): 800 Exhaust Temperature (°F): Ambient

Discharge Style: Horizontal

Authority for Requirement: DNR Construction Permit 95-A-330

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Authority for Requirement: 567 IAC 24.108(14)	
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Maintain a written record of the observation and any action resulting from the observation.

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU- 10.01	Clay Handling	CE-10: Fabric filter	Filter Aid	15 tons/yr	95-A-331

# **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.005 gr/dscf, 0.021 lb/hr, 0.09 tons/year	95-A-331, 567 IAC 23.3(2)"a",
Particulate Matter (PM)	0.1 gr/dscf	567 IAC 23.3(2)"d"

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

A. The stack exhaust shall be observed once per week and the presence/lack of a visible plume noted. If visible emissions are noted, the baghouse shall be inspected and necessary repairs completed within 24 hours of the observation. If, after 24 hours repairs have not been completed, the source shall be shutdown until they have been completed. The Department shall be notified of the exceedance and completion of the repairs within 24 hours of each respectively.

Authority for Requirement: DNR Construction Permit 95-A-331

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 40.8

Stack Opening, (inches, dia.): 4 Exhaust Flow Rate (acfm): 500 Exhaust Temperature (°F): Ambient

Authority for Requirement: DNR Construction Permit 95-A-331

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department

within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes ∐ No ⊠
Facility Maintained Operation & Maintenance Plan Required?	Yes No
Compliance Assurance Monitoring (CAM) Plan Required?	Yes ☐ No ⊠

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

## **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-11.01	Conveying	CE-11: Bag	Carrhagna	243 tons/hr	95-A-332-S5
EU-11.02	East Grain Cleaner	Filter	Soybeans	243 tons/hr	93-A-332-83

# **Applicable Requirements**

## Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit 95-A-332-S5,
Particulate Matter (PM <sub>10</sub> )	0.002 gr/dscf , 0.48 lb/hr	40 CFR 60 Subpart DD,
Particulate Matter (PM)	0.006 gr/dscf	567 IAC 23.1(2)"000"

#### **Other Emission Limits**

Pollutant	Limits	Reference	
Particulate Matter (PM) - State	0.1 gr/scf	DNR Construction Permit 95-A-332-S5,	
raticulate Watter (FWI) - State	0.1 g1/sc1	567 IAC 23.4(7)	
Particulate Matter (PM) -	0.01 am/deef	DNR Construction Permit 95-A-332-S5,	
Federal	0.01 gr/dscf	40 CFR 60 Subpart DD, 567 IAC 23.1(2)"000"	

## Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

**NSPS Applicability** 

EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
11.01,	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
11.01,	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 60

Stack Opening, (inches, dia.): 38 Exhaust Flow Rate (acfm): 28,000 Exhaust Temperature (°F): Ambient

Authority for Requirement: DNR Construction Permit 95-A-332-S5

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

## **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
An Agency O&M plan is located below for bag filter CE-11.	
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂
Authority for Requirement: 567 IAC 24.108(3)	

# Cargill Inc. – Sioux City, IA Baghouse Agency Operation & Maintenance Plan (EPs 2 and 11)

#### **Monitoring Guidelines**

The facility makes a commitment to take timely corrective action during periods of excursion where the indicators are out of range. A corrective action may include an investigation of the reason for the excursion, evaluation of the situation and necessary follow-up action to return operation within the indicator range. An excursion is determined by the averaged discrete data point over a period of time, or the presence of a monitored abnormal condition. An excursion does not necessarily indicate a violation of an applicable requirement. If the corrective action measures fail to return the indicators to the appropriate range, the facility will report the excursion to the department and conduct source testing within 90 days of the excursion to demonstrate compliance with the applicable requirements. If the test demonstrates compliance with emission limits then new indicator ranges must be set for monitoring and the new ranges must be incorporated in the operating permit. If the test demonstrates noncompliance with emission limits, then the facility, within 60 days, proposes a schedule to implement corrective action to bring the source into compliance and demonstrate compliance.

# Monitoring Methods and Corrective Actions

#### Weekly

• Visible emissions shall be observed on a weekly basis to ensure no visible emissions occur during the material handling operation of the unit. If visible emissions are observed this would be an excursion not a violation, and corrective action will be taken as soon as possible, but no later than 8 hours. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake readings at approximately 2 hour intervals throughout the day. If unsuccessful that day due to weather, an observation shall be made the following day.

• External inspection of baghouse components and area around baghouse for evidence of leaks, plugging and/or improperly working equipment.

#### Every 12 – 18 Months

- During each welding shutdown, a thorough inspection of the bags for leaks and wear.
   If leaks or abnormal conditions are detected the appropriate measures for remediation will be initiated and documented. Bag replacement should be documented by identifying the date and number of bags replaced. If the timeframe between welding shutdowns exceeds 18 months, inspections will be scheduled on the next planned down day.
- Inspect all components that are not subject to wear or plugging, including structural components, housing, ducts and hoods. If leaks or abnormal conditions are detected the appropriate measures for remediation will be initiated before the system is returned to service.
- Maintain a written record of the inspection and any action resulting from the inspection.

#### Recordkeeping

• Inspection records and record of any resulting corrective actions will be kept on-site for a minimum of five (5) years and made available upon request.

#### **Quality Control**

• All instruments and control equipment will be calibrated, maintained, and operated according to good air pollution control practices.

# Associated Equipment

Emission	<b>Emission Unit</b>	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-13.01	4 Flakers	CE-13.01: Cyclones	Soybeans	550 tons/day each	95-A-334-P8
	5 Flakers			330 tons/day each	
	6 Flakers			286 tons/day each	
EU-13.01	Conveyors			218.75 tons/hr	

## **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit 95-A-334-P8,
Particulate Matter (PM <sub>10</sub> )	1.50 lb/hr	567 IAC 23.4(7),
Particulate Matter (PM)	1.50 lb/hr, 0.1 gr/dscf	567 IAC 23.3(2)"d"

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The emission units (EU 13.01, 13.02) and control equipment (CE-13.01) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the emission units (EU 13.01, 13.02) and control equipment (CE-13.01). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission units (EU 13.01, 13.02) and/or control equipment (CE-13.01);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved:
  - d. Identification of the staff member performing the maintenance or inspection.
- C. The facility shall process a maximum of 1,916,250 tons of soybeans per twelve month rolling total.
- D. The owner or operator shall record the total amount of soybeans processed, in tons for each month.
- E. The owner or operator shall record the total amount of soybeans processed, in tons per twelve month period rolled monthly.
- F. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following: (1) A description of project 18-101,

- (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
- (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- H. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- I. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in condition H for a period of ten (10) years after the project 18-101 is completed.
- J. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 95-A-334-P8

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 106

Stack Opening, (inches, dia.): 36 Exhaust Flow Rate (scfm): 22,000 Exhaust Temperature (°F): 70

Discharge Style: Vertical, unobstructed

Authority for Requirement: DNR Construction Permit 95-A-334-P8

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🗵
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes ☐ No ⊠

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point. Authority for Requirement: 567 IAC 24.108(3)

### **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-13A.01	Flaking	CE-13A:	Carrhagna	218.75 ton/hr	98-A-401-P4
EU-13A.02	Conveyors	Cyclone	Soybeans	218.75 ton/hr	70-A-401-P4

# **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0% (1)	DNR Construction Permit 98-A-401-P4,
Particulate Matter (PM <sub>10</sub> )	0.292 lb/hr <sup>(2)</sup>	567 IAC 23.4(7),
Particulate Matter (PM) - State	0.584 lb/hr <sup>(2)</sup> , 0.1 gr/dscf	567 IAC 23.3(2)"d"

<sup>(1)</sup> An exceedance of the indicator opacity of "no visible emissions" will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

## Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The emission units (EU 13A.01, 13A.02) and control equipment (CE-13A) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the emission units (EU 13A.01, 13A.02) and control equipment (CE-13A). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission units (EU 13A.01, 13A.02) and/or control equipment (CE-13A);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- C. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions

<sup>(2)</sup> BACT emission limit based on a 4-hour average.

- (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- D. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- E. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM<sub>10</sub> and PM<sub>2.5</sub> that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- F. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in Condition E for a period of ten (10) years after the project 18-101 is completed.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 98-A-401-P4

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 35

Stack Opening, (inches, dia.): 24 Exhaust Flow Rate (scfm): 11,357 Exhaust Temperature (°F): 100

Discharge Style: Vertical, unobstructed

Authority for Requirement: DNR Construction Permit 98-A-401-P4

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from Authority for Requirement: 567 IAC 24.108(14)	the observation.
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

# Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU- 15.01	Hull Transfer Storage	CE-15: Bag Filter	Soybeans	15 tons/yr	95-A-336-S4

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.02 lb/hr <sup>(1)</sup> , 0.003 gr/dscf <sup>(1)</sup>	95-A-336-S4,
Particulate Matter (PM)	0.006 gr/dscf (1)	567 IAC 23.3(2)"d"

<sup>(1)</sup> BACT emission limit based on a 4-hour average.

#### **Other Emission Limits**

Pollutant	Limits	Reference
Particulate Matter (PM)	0.1 gr/scf	DNR Construction Permit 95-A-336-S4, 567 IAC 23.4(7)

## Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 96

Stack Opening, (inches, dia.): 8 Exhaust Flow Rate (acfm): 800 Exhaust Temperature (°F): 70

Authority for Requirement: DNR Construction Permit 95-A-336-S4

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

## **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes No No
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

# Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-16.01	Extraction Process	CE-16: Mineral Oil Absorption	Soybeans	1,916,250 tons/yr	95-A-337-P9

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Volatile Organic	737.76 tons/year <sup>(1)</sup> , 0.140 gal/ton <sup>(1) (2)</sup>	DNR Construction Permit 95-A-337-P9
Compounds (VOC)	757.76 tons/year , 0.116 gan ton	Britt Combination I Climit 75 11 357 17

<sup>(1)</sup> Facility-wide limit for solvent loss from vegetable oil production. Limit applies at all times.

#### **Other Emission Limits**

Pollutant	Limits	Reference
Particulate Matter (PM) - State	0.1 gr/scf	DNR Construction Permit 95-A-337-P9,
Volatile Organic Compounds	0.175 gal/ton (3)	567 IAC 23.4(7),
(VOC)	0.173 gai/ton	40 CFR 63 Subpart GGGG,
Total HAP	0.2 gal/ton <sup>(4)</sup>	567 IAC 23.1(4)"cg"

<sup>(3)</sup> United States v. Cargill, Incorporated, No. 05-2037JMR/FLN (D. Minn. Feb. 27, 2006) (consent decree).

## **NSPS and NESHAP Applicability**

EU ID	Subpart	Title	Туре	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(4)	§63.1 – §63.15
EU-16.01	GGGG	Solvent Extraction for Vegetable Oil Production	Existing	23.1(4)"cg"	\$63.2830 – \$63.2872

<sup>(2)</sup> Standard is a 12-month rolling average.

<sup>(4)</sup> Solvent Loss Factor to be used to determine compliance according with 40 CFR 63.2840 Equation 2. Limit covers entire vegetable oil production process.

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. Cargill facility 97-01-001 is limited to a facility-wide usage of 268,275 gallons of solvent per rolling 12-month period.
  - a. Record the amount of solvent loss, in gallons. Calculate and record monthly and 12-month rolling totals.
  - b. For the purposes of determining compliance with the BACT limit of 0.140 gal/ton, solvent losses from startups, shutdowns and malfunctions shall be included.
- B. The amount of soybeans crushed at this facility shall not exceed 1,916,250 tons per rolling 12-month period.
  - a. Record the amount of soybeans processed, in bushels and tons. Calculate and record monthly and 12-month rolling totals.
- C. Calculate the ratio of solvent loss to soybeans processed. Calculate and record the 12-month rolling value of this ratio. This 12-month period rolled monthly value shall also be used to verify compliance with the USA EPA Consent Decree value of 0.175 gal of hexane loss per ton of soybeans processed found under Emission Limits.
- D. The owner/operator shall operate the mineral oil scrubber to capture and recover solvent whenever the extraction process is operated.
- E. The emission unit (EU 16.01) and control equipment (CE-16) shall be operated and maintained according to the facility's maintenance schedule.
- F. A log of all maintenance and inspection activities performed on the emission unit (EU 16.01) and control equipment (CE-16). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission unit (EU 16.01) and/or control equipment (CE-16);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- G. To demonstrate compliance with the NESHAP limit of 0.2 gallons/ton the owner/operator shall determine the amount of soybeans processed and HAPs emitted by the methods in 40 CFR 63.2853 and 40 CFR 63.2855. Compliance with the NESHAP GGGG limit shall be determined according to 40 CFR 63.2840.
- H. The owner/operator shall develop and implement a written plan for demonstrating compliance. This plan shall meet the requirements of 40 CFR 63.2851.
- I. This facility shall develop and implement a written startup, shutdown and malfunction plan. This plan shall meet the requirements of 40 CFR 63.2852.
- J. The owner/operator shall submit all notifications required by NESHAP subpart GGGG according to 40 CFR 63.2860.
- K. The owner/operator shall submit all reports required by NESHAP subpart GGGG according to 40 CFR 63.2861.

L. The owner/operator shall keep all records required by NESHAP subpart GGGG according to 40 CFR 63.2862.

Authority for Requirement: DNR Construction Permit 95-A-337-P9

### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 73

Stack Opening, (inches, dia.): 6 Exhaust Flow Rate (scfm): N/A Exhaust Temperature (°F): 70

Discharge Style: Vertical, unobstructed

Authority for Requirement: DNR Construction Permit 95-A-337-P9

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring below.	g requirements listed
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes No No

Authority for Requirement: 567 IAC 24.108(3)

**Compliance Assurance Monitoring (CAM) Plan Required?** 

# Associated Equipment

Emission	Emission Unit	Raw	Rated	Construction
Unit	Description	Material	Capacity	Permit
EU-17.01	Package Boiler	Natural Gas	0.077 MMCF/hr	86-A-036-S6

# **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limits	Reference
Opacity	40% (1)	DND Construction Downit 96 A 026 S6
Particulate Matter (PM <sub>10</sub> )	0.70 lb/hr	DNR Construction Permit 86-A-036-S6,
Particulate Matter (PM)	0.70 lb/hr, 0.6 lb/MMBtu	567 IAC 23.3(2)"d", 567 IAC 23.3(2)"b"
Nitrogen Oxides (NO <sub>x</sub> )	50.66 tons/year (2)	307 IAC 23.3(2) U

<sup>(1)</sup> An exceedance of the indicator opacity of 10% will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).
(2) Total allowed for Boiler #2 and Boiler #3.

**NSPS and NESHAP Applicability** 

EU ID	Subpart	Title	Туре	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
17.01	Dc	Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units	NA	23.1(2)"111"	§60.40c – §60.48c

This emission unit is of the source category affected by the following federal regulation: *National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters* [40 CFR Part 63, Subpart DDDDD].

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. This emission unit shall be limited to using Natural Gas as fuel.
- B. Only one of Boilers #2 and #3 shall be operated at any given time except for periods of startup and shutdown of the boilers.
- C. Per 40 CFR §60.40c(g)(1), the owner or operator shall record and maintain records of the amount of each fuel combusted during each operating day. As an alternative to this requirement per 40 CFR §60.40c(g)(2) and 40 CFR §60.40c(g)(3), the owner or operator

may elect to either:

- Record and maintain records of the amount of each fuel combusted during each calendar month [See 40 CFR §60.40c(g)(2)] or
- Record and maintain records of the total amount of each steam generating unit fuel delivered to that property during each calendar month [See 40 CFR §60.40c(g)(3)].

Authority for Requirement: DNR Construction Permit 86-A-036-S6

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 38.5

Stack Opening, (inches, dia.): 36 Exhaust Flow Rate (scfm): 4,000 Exhaust Temperature (°F): 160

Discharge Style: Vertical Unobstructed

Authority for Requirement: DNR Construction Permit 86-A-036-S6

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU- 20.01	Pellet Transfer	CE-20: Bag filter	Soybean Pellets	20 tons/hr	98-A-402-S3

# **Applicable Requirements**

## Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit
Particulate Matter (PM <sub>10</sub> )	0.05 lb/hr <sup>(1)</sup> , 0.003 gr/dscf <sup>(1)</sup>	98-A-402-S3,
Particulate Matter (PM)	0.006 gr/dscf (1)	567 IAC 23.3(2)"d"

<sup>(1)</sup> BACT emission limit based on a 4-hour average.

#### **Other Emission Limits**

Pollutant	Limits	Reference
Particulate Matter (PM)	0.1 gr/scf	DNR Construction Permit 98-A-402-S3, 567 IAC 23.4(7)

## Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 96

Stack Opening, (inches): 7×9 Exhaust Flow Rate (acfm): 2,000 Exhaust Temperature (°F): Ambient

Authority for Requirement: DNR Construction Permit 98-A-402-S3

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

# **Associated Equipment**

Emission Unit	Emission Unit Description	Raw Material	Rated Capacity	Construction Permit
EU-21.01	Drying	Soybeans	165 tons/hr	
EU-21.02	In Process Natural Gas Usage	Natural Gas	0.04 MMCF/hr	95-A-340-S4

# **Applicable Requirements**

## Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit 95-A-340-S4,
Particulate Matter (PM <sub>10</sub> )	1.8 lb/hr, 0.00175 gr/dscf	40 CFR 60 Subpart DD
Particulate Matter (PM)	10.6 lb/hr, 0.01 gr/dscf	567 IAC 23.1(2) "000"

#### **Other Emission Limits**

· · · · · · · · · · · · · · · · · · ·					
Pollutant	Limits	Reference			
Particulate Matter (PM)	0.1 gr/scf	DND Construction Domnit 05 A 240 S4			
Sulfur Dioxide (SO <sub>2</sub> )	500 ppmv	DNR Construction Permit 95-A-340-S4, 567 IAC 23.4(7),			
Volatile Organic	0.0 tons/year	567 IAC 23.3(7), 567 IAC 23.3(3)			
Compounds (VOC)	0.9 tons/year	307 IAC 23.3(3)			

**NSPS** Applicability

	T				
EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
21.01,	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
21.01,	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The operation of the bean pre-cleaner system (EP#1 Grain Cleaner) is required whenever the Grain Dryer (EP-21) is in operation.
- B. The column dryer shall have column plate perorations not to exceed 2.4 mm in diameter (ca 0.094 inch).
- C. Maintain log of bean pre-cleaner system (EP#1 Grain Cleaner) operation and Berico Grain Dryer (EP-21) operation, which shall include date and time each unit is operated.

D. Verify and record diameter of column plate perorations within 60 days after the issuance of this permit and upon replacement or modification of column plates.

Authority for Requirement: DNR Construction Permit 95-A-340-S4

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 21 Stack Opening, (inches, dia.): N/A Exhaust Flow Rate (acfm): 124,000 Exhaust Temperature (°F): 80 Discharge Style: Horizontal

Authority for Requirement: DNR Construction Permit 95-A-340-S4

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂
A 1 1 C D 1 C C T A C C 1 100(2)	

# **Associated Equipment**

Emission Unit	Emission Unit Description	Raw Material	Rated Capacity	Construction Permit
EU-22.01	Drying	Soybeans	93 tons/yr	98-A-403-S3
EU-22.02	In Process Natural Gas Usage	Natural Gas	0.04 MMCF/hr	90-A-403-33

# **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DNR Construction Permit 98-A-403-S3
Particulate Matter (PM <sub>10</sub> )	0.98 lb/hr, 0.00175 gr/dscf	40 CFR 60 Subpart DD
Particulate Matter (PM)	5.6 lb/hr, 0.01 gr/dscf	567 IAC 23.1(2) "ooo"

#### **Other Emission Limits**

Pollutant	Limits	Reference
Particulate Matter (PM) - State	0.1 gr/scf	DND Construction Downit 09 A 402 S2
Sulfur Dioxide (SO <sub>2</sub> )	500 ppmv	<ul><li>DNR Construction Permit 98-A-403-S3,</li><li>567 IAC 23.4(7),</li></ul>
Volatile Organic Compounds (VOC)	0.9 tons/year	567 IAC 23.3(7), 567 IAC 23.3(3)

**NSPS Applicability** 

EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
22.01,	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
22.01,	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The operation of the bean pre-cleaner system (EP#1 Grain Cleaner) is required whenever the Grain Dryer II (EP-22) is in operation.
- B. The column dryer shall have column plate perorations not to exceed 2.4 mm in diameter (ca 0.094 inch).
- C. Maintain log of bean pre-cleaner system (EP#1 Grain Cleaner) operation and Grain Dryer II (EP-22) operation, which shall include date and time each unit is operated.
- D. Verify and record diameter of column plate perorations within 60 days after the issuance of this permit and upon replacement or modification of column plates.

Authority for Requirement: DNR Construction Permit 98-A-403-S3

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 65.5

Stack Opening, (inches, dia.): N/A Exhaust Flow Rate (acfm): 67,000 Exhaust Temperature (°F): 80 Discharge Style: Horizontal

Authority for Requirement: DNR Construction Permit 98-A-403-S3

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🔀
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🔀

# **Associated Equipment**

Emission Unit	Emission Unit Description	Raw Material	Rated Capacity	Construction Permit
EU-23.01	D 1'4' 1D '1	Natural Gas	0.1843 MMCF/hr	
EU-23.02	Reconditioned Boiler #3	Fuel Oil	1.25 kgal/hr	95-A-341-S7
EU-23.03	π3	Vegetable Oil	1.25 kgal/hr	

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **Natural Gas Emission Limits**

Pollutant	Limit	Reference
Opacity	0%, 20% (1)	DNR Construction Permit 95-A-341-S7 567 IAC 23.3(2) "d"
Particulate Matter (PM <sub>10</sub> )	5.06 tons/yr	DNR Construction Permit 95-A-341- S7
Particulate Matter (PM)	0.6 lb/MMBtu	DNR Construction Permit 95-A-341- S7 567 IAC 23.3(2) "b"
Sulfur Dioxide	29.28 tons/yr,	DNR Construction Permit 95-A-341- S7
$(SO_2)$	500 ppmv,	567 IAC 23.3(3) "e"
Nitrogen Oxides (NO <sub>x</sub> )	0.2 lb/MMBtu & 0.06 lb/MMBtu <sup>(2)</sup> , 10.1 lb/hr; 50.66 tons/yr <sup>(3)</sup>	DNR Construction Permit 95-A-341- S7 40 CFR 60 Subpart Db 567 IAC 23.1(2) "ccc"
Volatile Organic Compounds (VOC)	5.06 tons/yr	DNR Construction Permit 95-A-341- S7

<sup>(1)</sup>An exceedance of the indicator opacity of '10%' will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing). (2)Emission rate of NOx (30 day rolling average) as established by the Consent Decree- Civil Action Number 05-2037JMR/FLN

<sup>(3)</sup>Combined Limit for EP-17 (Boiler #2) and EP-23 (Boiler #3)

Liquid Fuels<sup>(4)</sup> Emission Limits

Pollutant	Limit	Reference
Opacity	10%; 20% (1)	DNR Construction Permit 95-A-341-S7 567 IAC 23.3(2) "d"
Particulate Matter (PM <sub>10</sub> )	2.5 lb/hr, 5.06 tons/yr	DNR Construction Permit 95-A-341-S7
Particulate Matter (PM)	0.6 lb/MMBtu	DNR Construction Permit 95-A-341-S7 567 IAC 23.3(2) "b"
Sulfur Dioxide (SO <sub>2</sub> )	2.5 lb/MMBtu, 29.28 tons/yr, 45.47 lb/hr	DNR Construction Permit 95-A-341-S7 567 IAC 23.3(3) "e"
Nitrogen Oxides (NO <sub>x</sub> )	0.2 lb/MMBtu & 0.06 lb/MMbtu <sup>(2)</sup> , 21.1 lb/hr, 50.66 tons/yr <sup>(3)</sup>	DNR Construction Permit 95-A-341-S7 40 CFR 60 Subpart Db 567 IAC 23.1(2) "ccc"
Volatile Organic Compounds (VOC)	1.3 lb/hr, 5.06 tons/yr	DNR Construction Permit 95-A-341-S7

<sup>(1)</sup>An exceedance of the indicator opacity of '10%' will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing). (2)Emission rate of NOx (30 day rolling average) as established by the Consent Decree- Civil Action Number 05-2037JMR/FLN

**NSPS** and Applicability

EU ID	Subpart	Title	Туре	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
23.01, 23.02, 23.03	Db	Standards of Performance for Industrial-Commercial-Institutional Steam Generating Units	NA	23.1(2)"ccc"	\$60.40b - \$60.48b

This emission unit is of the source category affected by the following federal regulation: *National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters* [40 CFR Part 63, Subpart DDDDD].

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. Only one of Boilers #2 and #3 shall be operated at any given time except for periods of startup and shutdown of the two boilers.
- B. Boiler #3 shall be limited to firing on natural gas, #2 fuel oil, or vegetable oil
- C. The Sulfur content of the #2 fuel oil used in this boiler shall not exceed 0.25%, by weight.
- D. The Sulfur content of the vegetable oil used in this boiler shall not exceed 0.15%, by weight.

<sup>(3)</sup> Combined Limit for EP-17 (Boiler #2) and EP-23 (Boiler #3)

<sup>(4)</sup>Liquid Fuels are limited to #2 Fuel Oil and Vegetable Oil.

- E. This plant shall not use more than 1,600,000 gallons of #2 fuel oil or vegetable oil as fuel per rolling twelve month period.
- F. The permittee shall maintain the following monthly records:
  - i. The plant-wide total quantity of #2 fuel oil and vegetable oil combusted (in gallons); and.
  - ii. A determination of the 12-month rolling total of #2 fuel oil and vegetable oil combusted (in gallons), plant-wide.
- G. Maintain records as to the sulfur content (% by weight) of the vegetable oil.
- H. The owner or operator of this emission unit shall follow the compliance requirements of 40 CFR§60.45b and 40 CFR§60.46b and the monitoring requirements of 40 CFR§60.47b and 40 CFR§60.48b.
- I. The owner or operator of this emission unit shall follow the notification, reporting, and recordkeeping requirements of 40 CFR§60.49b.

Authority for Requirement: DNR Construction Permit 95-A-341-S7

567 IAC 23.1(2)"ccc" 40 CFR 60 Subpart Db

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 100

Stack Opening, (inches, dia.): 36 Exhaust Flow Rate (scfm): 33,000 Exhaust Temperature (°F): 350

Discharge Style: Vertical, Unobstructed

Authority for Requirement: DNR Construction Permit 95-A-341- S7

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Continuous Emission Monitoring**

The owner/operator of this boiler shall install, performance evaluate, calibrate, maintain, and continuously operate a continuous emissions monitoring system (CEMS) and continuously record the output of the system for the measurement of  $NO_x$  for Boiler #3. The CEMS shall meet the requirements summarized below:

- A. All emission averages shall be the arithmetic average emission rate.
- B. Except for periods associated with system breakdowns, repairs, calibration checks, and zero and span adjustments, the CEMS shall be in continuous operation. The CEMS shall complete a minimum of one cycle of sampling, analyzing, and data recording for each successive 15-minute period.
- C. The CEMS shall continuously meet all the data recovery and performance requirements outlined in 40 CFR 60.48b. Should the CEMS fail to meet the data recovery and quality requirements that are specified in the reference subpart, the owner/operator shall immediately take all necessary corrective measures to return the CEMS to the requirements of the above referenced NSPS subpart. Failure to correct the situation will constitute a violation of the CEMS operating requirements.
- D. The owner/operator shall check the system periodically to determine if the CEMS readings are both accurate and precise. Daily quality assurance (QA) checks shall be done in accordance within the minimum requirements of 40 CFR 60.13 for each parameter monitored by assessing the precision and accuracy of the CEMS data using, at a minimum the procedures of 40 CFR 60, Appendix F, Procedure 1.
- E. CEMS data are recorded during periods of CEMS breakdowns, repairs, calibration checks, zero and span adjustments and periods of boiler non-operation shall not be included in the data averages computed to demonstrate compliance.

Authority for Requirement: DNR Construction Permit 95-A-341-S7

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity when combusting liquid fuels and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity > the applicable opacity limit is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have

been unsuccessful due to weather, an observation shall be made the next weather permits.	operating day where
Maintain a written record of the observation and any action resulting from Authority for Requirement: 567 IAC 24.108(14)	m the observation.
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
<b>Compliance Assurance Monitoring (CAM) Plan Required?</b>	Yes 🗌 No 🔀
Authority for Requirement: 567 IAC 24.108(3)	

# **Associated Equipment**

Emission Unit	Emission Unit Description	Raw Material	Rated Capacity	Construction Permit
EU-23.21	D 11 110 II	Natural Gas	0.1843 MMCF/hr	
EU-23.22	Boiler #3 Heat Recovery Stack	Fuel Oil	1.25 kgal/hr	07-A-989-S1
EU-23.23	Recovery Stack	Vegetable Oil	1.25 kgal/hr	

# **Applicable Requirements**

## Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### Natural Gas Emission limits

Pollutant	Limit	Reference	
Opacity	0%, 20% <sup>(1)</sup>	DNR Construction Permit 07-A-989-S1	
	0%, 20%	567 IAC 23.3(2) "d"	
Particulate Matter (PM <sub>10</sub> )	5.06 tons/yr	DNR Construction Permit 07-A-989-S1	
Particulate Matter (PM)	0.6 lb/MMBtu	DNR Construction Permit 07-A-989-S1	
	U.O ID/IVIIVIBLU	567 IAC 23.3(2) "b"	
Sulfur Dioxide (SO <sub>2</sub> )	29.28 tons/yr,	DNR Construction Permit 07-A-989-S1	
Sulful Dioxide (SO <sub>2</sub> )	500 ppmv	567 IAC 23.3(3) "e"	
	0.2 lb/MMBtu & 0.06	DNR Construction Permit 07-A-989-S1	
Nitrogen Oxides (NO <sub>x</sub> )	lb/MMBtu <sup>(2)</sup> , 10.1 lb/hr,	40 CFR 60 Subpart Db	
	50.66 tons/yr (3)	567 IAC 23.1(2) "ccc"	
Volatile Organic	5.06 tons/ur	DNR Construction Permit 07-A-989-S1	
Compounds (VOC)	5.06 tons/yr		

<sup>(1)</sup>An exceedance of the indicator opacity of (10%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing). (2)Emission rate of NOx (30 day rolling average) as established by the Consent Decree – Civil Action Number 05-2037JMR/FLN

<sup>(3)</sup> Combined Limit for EP-17 (Boiler #2) and EP-23 (Boiler #3)

(Liquid Fuels) Emission Limits

Pollutant	Limit	Reference
Onesita	10%, 20% (1)	DNR Construction Permit 07-A-989-S1
Opacity	10%, 20%	567 IAC 23.3(2)"d"
Particulate Matter (PM <sub>10</sub> )	2.5 lb/hr, 5.06 tons/yr	DNR Construction Permit 07-A-989-S1
Donticulate Metter (DM)	0.6 lb/MMBtu	DNR Construction Permit 07-A-989-S1
Particulate Matter (PM)	0.0 ID/IVIIVIDIU	567 IAC 23.3(2)"b"
Sulfum Diowide (SO.)	2.5 lb/MMBtu, 29.28 tons/yr,	DNR Construction Permit 07-A-989-S1
Sulfur Dioxide (SO <sub>2</sub> )	45.47 lb/hr	567 IAC 23.3(3)"e"
	0.2 lb/MMBtu &	DNR Construction Permit 07-A-989-S1
Nitrogen Oxides (NO <sub>x</sub> )	0.06 lb/MMBtu <sup>(2)</sup> ,	40 CFR 60 Subpart Db
	21.1 lb/hr, 50.66 tons/yr <sup>(3)</sup>	567 IAC 23.1(2)"ccc"
Volatile Organic	1.3 lb/hr,	DNR Construction Permit 07-A-989-S1
Compounds (VOC)	5.06 tons/yr	DINK Construction Perfilit 07-A-989-81

<sup>(1)</sup>An exceedance of the indicator opacity of (10%) will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing). (2)Emission rate of NOx (30 day rolling average) as established by the Consent Decree – Civil Action Number 05-2037JMR/FLN

**NSPS and NESHAP Applicability** 

EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
23.21, 23.22, 23.23	Db	Standards of Performance for Industrial-Commercial-Institutional Steam Generating Units	NA	23.1(2)"ccc"	§60.40b – §60.48b

This emission unit is of the source category affected by the following federal regulation: *National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters* [40 CFR Part 63, Subpart DDDDD].

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. Only one of Boilers #2 and #3 shall be operated at any given time except for periods of startup and shutdown of the two boilers.
- B. Boiler #3 shall be limited to firing on natural gas, #2 fuel oil, or vegetable oil
- C. The Sulfur content of the #2 fuel oil used in this boiler shall not exceed 0.25%, by weight.
- D. The Sulfur content of the vegetable oil used in this boiler shall not exceed 0.15%, by weight.
- E. This plant shall not use more than 1,600,000 gallons of #2 fuel oil or vegetable oil as fuel

<sup>(3)</sup> Combined Limit for EP-17 (Boiler #2) and EP-23 (Boiler #3)

<sup>(4)</sup>Liquid Fuels are limited to #2 Fuel Oil and Vegetable Oil.

per rolling twelve month period.

- F. The permittee shall maintain the following monthly records:
  - i. the plant-wide total quantity of #2 fuel oil and vegetable oil combusted (in gallons); and,
  - ii. a determination of the 12-month rolling total of #2 fuel oil and vegetable oil combusted (in gallons), plant-wide.
- G. Maintain records as to the sulfur content (% by weight) of the vegetable oil.
- H. The owner or operator of this emission unit shall follow the compliance requirements of 40 CFR§60.45b and 40 CFR§60.46b and the monitoring requirements of 40 CFR§60.47b and 40 CFR§60.48b.
- I. The owner or operator of this emission unit shall follow the notification, reporting, and recordkeeping requirements of 40 CFR§60.49b.

Authority for Requirement: DNR Construction Permit 07-A-989-S1

567 IAC 23.1(2)"ccc" 40 CFR 60 Subpart Db

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 100

Stack Opening, (inches, dia.): 36 Exhaust Flow Rate (scfm): 33,000 Exhaust Temperature (°F): 350

Discharge Style: Vertical, Unobstructed

Authority for Requirement: DNR Construction Permit 07-A-989-S1

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity when combusting liquid fuels and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity > the applicable opacity limit is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting from the observation. Authority for Requirement: 567 IAC 24.108(14)

#### **Continuous Emission Monitoring**

The owner/operator of this boiler shall install, performance evaluate, calibrate, maintain, and continuously operate a continuous emissions monitoring system (CEMS) and continuously record the output of the system for the measurement of  $NO_x$  for Boiler #3. The CEMS shall meet the requirements summarized below:

- A. All emission averages shall be the arithmetic average emission rate.
- B. Except for periods associated with system breakdowns, repairs, calibration checks, and zero and span adjustments, the CEMS shall be in continuous operation. The CEMS shall complete a minimum of one cycle of sampling, analyzing, and data recording for each successive 15-minute period.
- C. The CEMS shall continuously meet all the data recovery and performance requirements outlined in 40 CFR 60.48b. Should the CEMS fail to meet the data recovery and quality requirements that are specified in the reference subpart, the owner/operator shall immediately take all necessary corrective measures to return the CEMS to the requirements of the above referenced NSPS subpart. Failure to correct the situation will constitute a violation of the CEMS operating requirements.
- D. The owner/operator shall check the system periodically to determine if the CEMS readings are both accurate and precise. Daily quality assurance (QA) checks shall be done in accordance within the minimum requirements of 40 CFR 60.13 for each parameter

- monitored by assessing the precision and accuracy of the CEMS data using, at a minimum the procedures of 40 CFR 60, Appendix F, Procedure 1.
- E. CEMS data are recorded during periods of CEMS breakdowns, repairs, calibration checks, zero and span adjustments and periods of boiler non-operation shall not be included in the data averages computed to demonstrate compliance.

Authority for Requirement: DNR Construction Permit 07-A-989-S1

Agency Approved Operation & Maintenance Plan Required?	Yes No No
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🔀
Compliance Assurance Monitoring (CAM) Plan Required?	Yes No No

Authority for Requirement: 567 IAC 24.108(3)

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-25.01	Storage Tank	CE-25: Baghouse	Filter Aid/Trisyl	48,000 scf/hr	94-A-507

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant: Opacity Emission Limit(s): 5%

Authority for Requirement: DNR Construction Permit 94-A-507

567 IAC 23.3(2)"d"

Pollutant: PM<sub>10</sub>

Emission Limit(s): 0.005 gr/dscf, 0.03 lb/hr, 0.13 tons/yr

Authority for Requirement: DNR Construction Permit 94-A-507

Pollutant: Particulate Matter (PM) Emission Limit(s): 0.1 gr/scf

Authority for Requirement: 567 IAC 23.3(2)"a"

# **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

There are no operational requirements at this time.

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 45 Stack Opening, (inches, dia.): 5x4.5 Exhaust Flow Rate (acfm): 800 Exhaust Temperature (°F): 70

Authority for Requirement: DNR Construction Permit 94-A-507

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>5 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting fro Authority for Requirement: 567 IAC 24.108(14)	om the observation.
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Authority for Requirement: 567 IAC 24.108(3)

# **Associated Equipment**

Emission Unit	Emission Unit Description	Control Equipment	Raw Material	Rated Capacity	Construction Permit
EU-26.01	Bean Truck Receiving II (Receiving Pit)	CE-26: Bag	Carbaana	1050 tons/hr instantaneous,	96-A-1253-P7
EU-26-02	Bean Truck Receiving II (Conveyance)	Filter	Soybeans	780 tons/hr operational	90-A-1233-P7

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference			
Opacity	0%	DNR Construction Permit 96-			
Particulate Matter (PM <sub>10</sub> )	0.87 lb/hr, 0.003 gr/dscf	A-1253-P7,			
Particulate Matter (PM) - State	1.8 lb/hr,0.006gr/dscf	567 IAC 23.3(2)"d"			

#### **Other Emission Limits**

Pollutant	Limits	Reference			
Opacity (Fugitive)	5%	DND Construction Domnit OC A 1252 D7			
Opacity	0%	DNR Construction Permit 96-A-1253-P7,			
Particulate Matter (PM) -	0.022 cm/ds cm (1)	40 CFR 60 Subpart DD, 567 IAC 23.1(2)"000"			
Federal	0.023 gr/dscm (1)	307 IAC 23.1(2) 000			

<sup>(1)</sup> 0.023 grams per dry standard cubic meter (g/dscm) = 0.01 grains per dry standard cubic foot (gr/dscf)

**NSPS** Applicability

EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
26.01,	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
26.02	DD	Standards of Performance for Grain Elevators	NA	23.1(2)"000"	§60.300 – §60.304

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The owner or operator shall maintain the control equipment according to good manufacturing practices.
- B. The owner or operator shall maintain a log of control equipment inspections and maintenance, and all actions resulting from the inspections and maintenance.
- C. Bean Truck Receiving II (EP-26) shall not receive more than 780 tons of soybeans per

- hour, averaged daily.
- D. The owner or operator shall maintain a record of the amount of beans received at Bean Truck Receiving II, in tons, each day it operates.
- E. The owner or operator shall maintain a record of the amount of time Bean Truck Receiving II received beans, each day it operates.
- F. The owner or operator shall calculate the average daily throughput of Bean Truck Receiving II in tons per hour by dividing the amount of beans received each day at Bean Truck Receiving II by the amount of time Bean Truck Receiving II receives beans.

Authority for Requirement: DNR Construction Permit 96-A-1253-P7

## **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 150

Stack Opening, (inches, dia.): 38 Exhaust Flow Rate (scfm): 34,000 Exhaust Temperature (°F): Ambient Discharge Style: Vertical, unobstructed

Authority for Requirement: DNR Construction Permit 96-A-1253- P7

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

#### **Opacity Monitoring**

The facility shall check the opacity weekly during a period when the emission unit on this emission point is at or near full capacity and record the reading. Maintain a written record of the observation and any action resulting from the observation for a minimum of five years. Opacity shall be observed to ensure that no visible emissions occur during the material handling operation of the unit. If visible emissions are observed corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If corrective action does not return the observation to no visible emissions, then a Method 9 observation will be required. If an opacity (>0 %) is observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer from conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake opacity readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Maintain a written record of the observation and any action resulting fro Authority for Requirement: 567 IAC 24.108(14)	m the observation
Agency Approved Operation & Maintenance Plan Required?	Yes ☐ No ⊠
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🔀
Facility operation and maintenance plans must be sufficient to yield reli	able data from the

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

Authority for Requirement: 567 IAC 24.108(3)

# Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU- 27.01	Bean Conditioner	CE-27.01: Cyclone	Soybeans	218.75 tons/hr	98-A-404-P4

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

#### **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0% (1)	DND Construction Domnit 08 A 404 D4
Particulate Matter (PM <sub>10</sub> )	0.14 lb/hr, 0.01 gr/dscf	DNR Construction Permit 98-A-404-P4,
Particulate Matter (PM) - State	0.28 lb/hr, 0.02 gr/dscf	567 IAC 23.3(2)"d"

<sup>(1)</sup> An exceedance of the indicator opacity of "no visible emissions" will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The emission unit (EU 27.01) and control equipment (CE-27.01) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the emission unit (EU 27.01) and control equipment (CE-27.01). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission unit (EU 27.01) and/or control equipment (CE-27.01);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved:
  - d. Identification of the staff member performing the maintenance or inspection.
- C. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions

- (BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.
- D. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).
- E. Per 567 IAC 33.3(18)"f"(4), the owner or operator shall:
  - (1) Monitor the emission of PM, PM10 and PM2.5 that is emitted by any emissions unit affected by project 18-101.
  - (2) Calculate the annual emissions, in tons per year on a calendar-year basis, for a period of ten (10) years following resumption of regular operations and maintain a record of regular operations after the change.
- F. Per 567 IAC 33.3(18)"f"(5), the owner or operator shall retain a written record containing the information required in Condition E for a period of ten (10) years after the project 18-101 is completed.
- G. Per 567 IAC 33.3(18)"g", the owner or operator shall make the information required to be documented and maintained pursuant to 567 IAC 33.3(18)"f" available for review upon request for inspection by the Department or the general public pursuant to the requirements for Title V operating permits contained in 567 IAC 24.107(6).

Authority for Requirement: DNR Construction Permit 98-A-404-P4

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 40.5

Stack Opening, (inches, dia.): 12 Exhaust Flow Rate (scfm): 1,606 Exhaust Temperature (°F): 200

Discharge Style: Vertical, Unobstructed

Authority for Requirement: DNR Construction Permit 98-A-404-P4

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring	g requirements listed
below.	
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Authority for Requirement: 567 IAC 24.108(3)

## **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU- 28.01	Pellet Cooler	CE-28: Cyclone	Soybean Pellets	20 tons/hr	98-A-405-P5

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

# **BACT Emission Limits**

Pollutant	Limit	Reference
Opacity	0%	DND Construction Dennit 00 A 405 D5
Particulate Matter (PM <sub>10</sub> )	0.16 lb/hr, 0.003 gr/dscf	DNR Construction Permit 98-A-405-P5,
Particulate Matter (PM) - State	0.32 lb/hr, 0.006 gr/dscf	567 IAC 23.3(2)"d"

#### Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

#### **Operating Limits**

- A. The production rate of this emission unit (Pellet Cooler, EU 28.01) shall not exceed 15 tons/hr (daily average).
- B. The owner or operator shall maintain the control equipment (CE-28) according to manufacturer's specifications and maintenance schedule or per a written facility specific operation and maintenance plan.

# Reporting and Recordkeeping

- A. A log detailing the following:
  - The date,
  - The total production for this emission unit (Pellet Cooler, EU 28.01) for each day,
  - The hours of operation for this emission unit (Pellet Cooler, EU 28.01) for each day, and
  - The average daily production rate for this emission unit (Pellet Cooler, EU 28.01).
- B. A log of all inspections and maintenance of the control equipment (CE-28).
- C. A log of all actions resulting from the inspections and maintenance of the control equipment (CE-28).

Authority for Requirement: DNR Construction Permit 98-A-405-P5

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 75 Stack Opening, (inches, dia.): 20 Exhaust Flow Rate (scfm): 4,700 Exhaust Temperature (°F): 135

Discharge Style: Unobstructed vertical

Authority for Requirement: DNR Construction Permit 98-A-405-P5

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring	requirements listea
below.	
Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂

Yes No **Facility Maintained Operation & Maintenance Plan Required?** 

Yes No No **Compliance Assurance Monitoring (CAM) Plan Required?** 

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point.

Authority for Requirement: 567 IAC 24.108(3)

# **Associated Equipment**

Emission	Emission Unit	Raw	Rated	Construction
Unit	Description	Material	Capacity	Permit
EU-29.01	GTX Refinery Boiler	Natural Gas	13.0 MMBtu/hr 0.013 MMCF/hr	99-A-677

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	40%	DNR Construction Permit 99-A-677,
Particulate Matter (PM)	0.6 lb/MMBtu	567 IAC 23.3(2)"d", 567 IAC 23.3(2)"b"(2)

**NSPS and NESHAP Applicability** 

EU ID	Subpart	Title	Type	State Reference (567 IAC)	Federal Reference (40 CFR)
	A	General Provisions	NA	23.1(2)	§60.1 – §60.19
29.01	Dc	Standards of Performance for Small Industrial-Commercial- Institutional Steam Generating Units	NA	23.1(2)"III "	\$60.40c – \$60.48c

This emission unit is of the source category affected by the following federal regulation: *National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters* [40 CFR Part 63, Subpart DDDDD].

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The unit is restricted to the combustion of natural gas only.
- B. The requirement of 40 CFR 60.48c (g) to record and maintain the amount of fuel combusted is reduced from daily to monthly.

Authority for Requirement: DNR Construction Permit 99-A-667

567 IAC 23.1(2)"III" 40 CFR 60 Subpart Dc

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 38

Stack Opening, (inches, dia.): 24 Exhaust Flow Rate (acfm): 5,800 Exhaust Temperature (°F): 600

Authority for Requirement: DNR Construction Permit 99-A-667

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Page 88 of 115

Authority for Requirement: 567 IAC 24.108(3)

# **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-30	Meal Flow Additive Tank	CE-30: Bin Vent Filter	Meal Additive	19.5 tons/hr	02-A-282-S1

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	No VE (1)	DNR Construction Permit 02-A-282-S1,
Particulate Matter (PM)	0.1 gr/dscf	567 IAC 23.3(2)"d", 567 IAC 23.3(2)"a"

<sup>(1)</sup> If visible emissions are observed other than startup, shutdown, or malfunction a stack test may be required to demonstrate compliance with the particulate standard.

# **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The control equipment associated with the emission unit that exhausts from this emission point shall be maintained according to the manufacturer's specifications.
- B. The owner or operator shall maintain a record of control equipment maintenance and inspection results.

Authority for Requirement: DNR Construction Permit 02-A-282-S1

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 65

Stack Opening, (inches, dia.): 7

Exhaust Flow Rate (scfm): 600 when filling

Exhaust Temperature (°F): Ambient

Discharge Style: Horizontal

Authority for Requirement: DNR Construction Permit 02-A-282-S1

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

# **Opacity Monitoring**

Visible emissions shall be observed on a weekly basis to ensure none occur when the emission unit on this emission point is at or near full capacity. If visible emissions are observed, this would be a violation and corrective action will be taken as soon as possible, but no later than eight hours from the observation of visible emissions. If weather conditions prevent the observer form conducting an opacity observation, the observer shall note such conditions on the data observation sheet. At least three attempts shall be made to retake visible emissions readings at approximately 2-hour intervals throughout the day. If all observation attempts for a week have been unsuccessful due to weather, an observation shall be made the next operating day where weather permits.

Authority for Requirement: 567 IAC 24.108(14)

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🛛 No 🗌
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂

Facility operation and maintenance plans must be sufficient to yield reliable data from the relevant time period that are representative of the source's compliance with the applicable requirements.

The data pertaining to the plan shall be maintained on site for at least 5 years. The plan and associated recordkeeping provides documentation of this facility's implementation of its obligation to operate according to good air pollution control practice.

Good air pollution control practice is achieved by adoption of quality control standards in the operation and maintenance procedures for air pollution control that are comparable to industry quality control standards for the production processes associated with this emission point. Authority for Requirement: 567 IAC 24.108(3)

## **Associated Equipment**

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-32	Soybean CoProduct L/O System	CE-32: Bag Filter	Soybean CoProduct	8 tons/hr	02-A-555-S1

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	40% (1)	DNR Construction Permit 02-A-555-S1,
Particulate Matter (PM)	0.005 gr/dscf	567 IAC 23.3(2)"d"

<sup>(1)</sup>An exceedance of the indicator opacity of no visible emissions will require the owner/operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the DNR may require additional proof to demonstrate compliance (e.g., stack testing).

# Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The control equipment shall be inspected and maintained according to manufacturer's specifications.
- B. The owner or operator shall maintain a record of control equipment maintenance and inspection results.

Authority for Requirement: DNR Construction Permit 02-A-555-S1

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 97

Stack Opening, (inches): 7×9 Exhaust Flow Rate (scfm): 1,000 Exhaust Temperature (°F): Ambient

Discharge Style: Horizontal

Authority for Requirement: DNR Construction Permit 02-A-555-S1

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

# **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes ☐ No ⊠

Authority for Requirement: 567 IAC 24.108(3)

# Associated Equipment

Emission	Emission Unit	Raw	Rated	Construction
Unit	Description	Material	Capacity	Permit
EU-33	Vegetable Oil Refinery	Vegetable Oil	1,180 Million lb/yr	03-A-028-S1

# **Applicable Requirements**

#### Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Volatile Organic Compounds (VOC)	36.0 tons/yr (1)	DND Construction Downit 02 A 020 S1
Hazardous Air Pollutant (Single HAP)	23.4 tons/yr (2)	DNR Construction Permit 03-A-028-S1

<sup>(1)</sup> Limit is for VOCs from oil from outside suppliers, all VOCs from oil produced at this plant is accounted for in Construction Permit Number 95-A-337-S6.

#### **Operational Limits & Reporting/Record keeping Requirements**

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

#### **Operating Limits**

- A. The amount of vegetable oil received from outside suppliers that is processed in the Refinery Process at this plant shall not exceed 720,000,000 pounds in any rolling twelvementh period. This shall include crude vegetable oil and semi-refined vegetable oil.
- B. The total amount of vegetable oil processed in the Refinery Process at this plant shall not exceed 1,180,000,000 pounds in any rolling twelve-month period.

# Reporting and Recordkeeping

- A. The permittee shall keep records on the VOC and the HAP content of the vegetable oil that is received from outside suppliers for processing in the Refinery. A sample of oil shall be taken from each truck and railcar that deliver oil from an outside supplier. During a 24 hour period, a composite sample from all trucks and/or railcars that contain the same type of oil from the same facility shall be prepared and analyzed for VOC (ppm by wt.) This shall include both crude and semi-refined vegetable oils.
- B. The analysis for VOC may be reduced for semi-refined vegetable oil received from outside suppliers in the following way. The oil shall be sampled and analyzed in accordance with the procedure described in Condition (A) for a three month period. If no VOC is detected in the semi-refined oil, the analysis may be reduced to a monthly analysis of a composite sample from all trucks and/or railcars that contain the same type of oil from the same facility. The composite sample shall be composed of a sample of oil from each truck and railcar that deliver oil from the outside supplier during a period of a

<sup>(2)</sup> Potential to emit for n-hexane (CAS # 110543) emissions from the refining of oil from outside suppliers, based on 65% of the potential to emit for VOC.

month. If the monthly analysis shows that the oil contains VOC, the sampling and analysis shall return to the procedure described in Condition (A).

- C. The permittee shall keep the following monthly records:
  - i. The total amount of vegetable oil that is processed in the Refinery Process at this plant (pounds).
  - ii. The rolling 12-month total of the amount of vegetable oil that is processed in the Refinery Process at this plant (pounds).
  - iii. The amount of vegetable oil received from outside suppliers that are processed in the Refinery Process at this plant (pounds). This shall include both crude and semi-refined vegetable oils.
  - iv. The rolling 12-month total of the amount of vegetable oil received from outside suppliers that are processed in the Refinery Process at this plant (pounds). This shall include both crude and semi-refined vegetable oils.
  - v. The amount of VOC emitted from the processing of vegetable oil received from outside suppliers in the Refinery Process at this plant (tons). This shall be based on the amount of oil received and the analysis of the composite sample of the oil.
  - vi. The rolling 12-month emission rate of VOC from the processing of vegetable oil received from outside suppliers in the Refinery Process at this plant (tons).
  - vii. The amount of HAP emitted from the processing of vegetable oil received from outside suppliers in the Refinery Process at this plant (tons).
  - viii. The rolling 12-month emission rate of HAP from the processing of vegetable oil received from outside suppliers in the Refinery Process at this plant (tons).

Authority for Requirement: DNR Construction Permit 03-A-028-S1

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?	Yes 🗌 No 🖂
A 11 11 5 B 11 1 5 5 T LAC 24 100(2)	

Page 95 of 115

## Associated Equipment

Emission	Emission Unit	Control	Raw	Rated	Construction
Unit	Description	Equipment	Material	Capacity	Permit
EU-38.01	Dehulling Process	CE-38: Baghouse	Soybeans	218.75 ton/hr	18-A-167

# **Applicable Requirements**

# Emission Limits (lb./hr, gr./dscf, lb./MMBtu, % opacity, etc.)

The emissions from this emission point shall not exceed the levels specified below.

Pollutant	Limit	Reference
Opacity	40% (1)	DND Comment on Domest 10 A 167
Particulate Matter (PM <sub>2.5</sub> )	0.58 lb/hr	DNR Construction Permit 18-A-167,
Particulate Matter (PM <sub>10</sub> )	0.87 lb/hr	567 IAC 23.3(2)"d", 567 IAC 23.4(7)
Particulate Matter (PM)	0.87 lb/hr, 0.1 gr/dscf	307 IAC 23.4(7)

<sup>(1)</sup> An exceedance of the indicator opacity of no visible emissions will require the owner or operator to promptly investigate the emission unit and make corrections to operations or equipment associated with the exceedance. If exceedances continue after the corrections, the Department may require additional proof to demonstrate compliance (e.g., stack testing).

## Operational Limits & Reporting/Record keeping Requirements

The owner/operator of this equipment shall comply with the operational limits and requirements listed below. Records shall be kept on site for at least five years and shall be available for inspection by the Department.

- A. The emission unit (EU 38.01) and control equipment (CE-38) shall be operated and maintained according to the facility's maintenance schedule.
- B. A log of all maintenance and inspection activities performed on the emission unit (EU 38.01) and control equipment (CE-38). This log shall include, but is not necessarily limited to:
  - a. The date and time any inspection and/or maintenance was performed on the emission unit (EU 38.01) and/or control equipment (CE-38);
  - b. Any issues identified during the inspection and the date each issue was resolved;
  - c. Any issues addressed during the maintenance activities and the date each issue was resolved;
  - d. Identification of the staff member performing the maintenance or inspection.
- C. Per 567 IAC 33.3(18)"f"(1), prior to beginning actual construction of project 18-101 the owner or operator shall document and maintain a record of the following:
  - (1) A description of project 18-101,
  - (2) Identification of the emission unit(s) whose emissions of a regulated NSR pollutant could be affected by project 18-101, and
  - (3) A description of the applicability test used to determine that the project is not a major modification for any regulated NSR pollutant, including the baseline actual emissions

(BAE), the projected actual emissions (PAE), the amount of emissions excluded under paragraph "3" of the definition of "projected actual emissions" in subrule 33.3(1), an explanation describing why such amount was excluded, and any netting analysis if applicable.

Authority for Requirement: DNR Construction Permit 18-A-167

#### **Emission Point Characteristics**

The emission point shall conform to the specifications listed below.

Stack Height, (ft, from the ground): 50 Stack Opening, (inches, dia.): 40 Exhaust Flow Rate (scfm): 34,000 Exhaust Temperature (°F): 70

Discharge Style: Vertical unobstructed

Authority for Requirement: DNR Construction Permit 18-A-167

The temperature and flowrate are intended to be representative and characteristic of the design of the permitted emission point. The Department recognizes that the temperature and flow rate may vary with changes in the process and ambient conditions. If it is determined that any of the emission point characteristics above are different than the values stated, the owner or operator shall submit a request either by electronic mail or written correspondence to the Department within thirty (30) days of the discovery to determine if a permit amendment is required, or submit a permit application requesting to amend the permit.

#### **Monitoring Requirements**

The owner/operator of this equipment shall comply with the monitoring requirements listed below.

Agency Approved Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Facility Maintained Operation & Maintenance Plan Required?	Yes 🗌 No 🖂
Compliance Assurance Monitoring (CAM) Plan Required?  A CAM plan is included below.	Yes 🛛 No 🗌
Authority for Requirement: 567 IAC 24.108(3)	

# Compliance Assurance Monitoring Plan for Cargill, Inc. Facility located in Sioux City, Iowa

# EP 38 – Dehulling

### I. Background

A. Emissions Unit

Description: Dehulling Process

Identification: EP 38

Facility: Cargill, Inc. – Sioux City, IA

B. Applicable Regulation, Emission Limit, and Monitoring Requirements

Regulation No.: Permit # 18-A-167 Emission Limit or Standard: 0.87 lb/hr PM

Current Monitoring requirements: Daily Pressure drop readings, monthly process rate

monitoring, weekly visible emissions checks when

operating.

C. <u>Control Technology</u> Baghouse

# II. Monitoring Approach

#### A. Indicator

Daily pressure drop checks will be used as an indicator.

#### B. Measurement Approach

Pressure drop will be checked daily to ensure that pressure drop is between 0.25 inches H<sub>2</sub>O and 8 inches H<sub>2</sub>O during the material handling operation of the unit.

#### C. Indicator Range

0.25 to 8 inches of H<sub>2</sub>O

#### D. QIP (Quality Improvement Plan) Threshold (Optional)

The QIP threshold is six excursions in a six month reporting period

#### E. Performance Criteria

Data representativeness: An increase in pressure drop above 8 inches of

water would indicate a decrease in the performance of the baghouse and potentially indicate an increase

in particulate matter.

Verification of operational status: Records of pressure drop readings will be

maintained for five years

QA/QC practices and criteria: The facility shall check pressure drop daily when

the emission unit on this emission point is in operation. If a pressure drop greater than four inches of water is observed, corrective action will

be taken.

Monitoring frequency: Pressure drop readings shall be conducted daily

during a period when the emission unit on this emission point is in operation. Records of the readings shall be maintained for five years.

# III. Justification

#### A. Background

This emission point is in part of the prep process. EP 38 involves the dehulling process where the soybean hulls are cracked and/or removed from the soybeans prior to further processing. The emissions from this source are controlled by a bag filter.

#### B. Rationale for Selection of Performance Indicator

The daily pressure drop readings were selected as the performance indicator because it is indicative of operation of the baghouse in a manner necessary to comply with the particulate emission standard. An increase in pressure drop beyond eight inches of water would indicate a reduced performance of this baghouse. Therefore, the detection of excessive pressure drop is used as a performance indicator.

#### C. Rationale for Selection of Indicator Level

The selected indicator range is a pressure drop of 0.25 to 8 inches of water. If a pressure drop greater than 8 inches of water is observed, corrective action will be taken.

A pressure drop of 0.25 to 8 inches of water was selected as an indicator range because a pressure drop greater than 8 inches of water is indicative of a potential increase in particulate emissions due to a decrease in the performance of this baghouse. If this baghouse is operating properly, there will not be a pressure drop greater than 8 inches of water except during start up, shutdown and upset conditions.

The selected QIP threshold for the baghouse is six excursions in a six-month reporting period. If the QIP threshold is exceeded in a semi-annual reporting period, a QIP will be developed and implemented.

# IV. General Conditions

This permit is issued under the authority of the Iowa Code subsection 455B.133(8) and in accordance with 567 Iowa Administrative Code (IAC). When 567 IAC as amended May 15, 2024, and cited in this permit becomes State Implementation Plan (SIP) approved, it will supersede 567 IAC as amended February 8, 2023. Prior to May 15, 2024, all Title V rule citations in this Title V permit were found and cited in 567 IAC Chapter 22. During the period from May 15, 2024, to the date that 567 IAC as amended May 15, 2024, is approved into the SIP, both 567 IAC as amended May 15, 2024, and 567 IAC as amended February 8, 2023 form the legal basis for the applicable requirements included in this permit. A crosswalk showing the citation changes is attached to this permit in Appendix B.

# **G1.** Duty to Comply

- 1. The permittee must comply with all conditions of the Title V permit. Any permit noncompliance constitutes a violation of the Act and is grounds for enforcement action; for a permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. 567 IAC 24.108(9)"a"
- 2. Any compliance schedule shall be supplemental to, and shall not sanction noncompliance with, the applicable requirements on which it is based. 567 IAC 24.105(2)"h"(3)
- 3. Where an applicable requirement of the Act is more stringent than an applicable requirement of regulations promulgated under Title IV of the Act, both provisions shall be enforceable by the administrator and are incorporated into this permit. 567 IAC 24.108(1)"b"
- 4. Unless specified as either "state enforceable only" or "local program enforceable only", all terms and conditions in the permit, including provisions to limit a source's potential to emit, are enforceable by the administrator and citizens under the Act. 567 IAC 24.108(14)
- 5. It shall not be a defense for a permittee, in an enforcement action, that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of the permit. 567 IAC 24.108(9)"b"
- 6. For applicable requirements with which the permittee is in compliance, the permittee shall continue to comply with such requirements. For applicable requirements that will become effective during the permit term, the permittee shall meet such requirements on a timely basis. 567 IAC 24.108(15)"c"

# **G2. Permit Expiration**

- 1. Except as provided in rule 567—24.104(455B), permit expiration terminates a source's right to operate unless a timely and complete application for renewal has been submitted in accordance with rule 567—24.105(455B). 567 IAC 24.116(2)
- 2. To be considered timely, the owner, operator, or designated representative (where applicable) of each source required to obtain a Title V permit shall submit on forms or electronic format specified by the Department. Additional copies to local programs or EPA are not required for application materials submitted through the electronic format specified by the Department. The application must include all emission points, emission units, air pollution control equipment, and monitoring devices at the facility. All emissions generating activities, including fugitive emissions, must be included. The definition of a complete application is as indicated in 567 IAC 24.105(2). 567 IAC 24.105

#### **G3.** Certification Requirement for Title V Related Documents

Any application, report, compliance certification or other document submitted pursuant to this permit shall contain certification by a responsible official of truth, accuracy, and completeness. All certifications shall state that, based on information and belief formed after reasonable

inquiry, the statements and information in the document are true, accurate, and complete. 567 IAC 24.107(4)

# **G4.** Annual Compliance Certification

By March 31 of each year, the permittee shall submit compliance certifications for the previous calendar year. The certifications shall include descriptions of means to monitor the compliance status of all emissions sources including emissions limitations, standards, and work practices in accordance with applicable requirements. The certification for a source shall include the identification of each term or condition of the permit that is the basis of the certification; the compliance status; whether compliance was continuous or intermittent; the method(s) used for determining the compliance status of the source, currently and over the reporting period consistent with all applicable department rules. For sources determined not to be in compliance at the time of compliance certification, a compliance schedule shall be submitted which provides for periodic progress reports, dates for achieving activities, milestones, and an explanation of why any dates were missed and preventive or corrective measures. The compliance certification shall be submitted to the administrator, director, and the appropriate DNR Field office. 567 IAC 24.108(15)"e"

#### **G5. Semi-Annual Monitoring Report**

By March 31 and September 30 of each year, the permittee shall submit a report of any monitoring required under this permit for the 6 month periods of July 1 to December 31 and January 1 to June 30, respectively. All instances of deviations from permit requirements must be clearly identified in these reports, and the report must be signed by a responsible official, consistent with 567 IAC 24.107(4). The semi-annual monitoring report shall be submitted to the director and the appropriate DNR Field office. 567 IAC 24.108 (5)

#### **G6.** Annual Fee

- 1. The permittee is required under subrule 567 IAC 24.106 to pay an annual fee based on the total tons of actual emissions of each regulated air pollutant. Beginning July 1, 1996, Title V operating permit fees will be paid on July 1 of each year. The fee shall be based on emissions for the previous calendar year.
- 2. The fee amount shall be calculated based on the first 4,000 tons of each regulated air pollutant emitted each year. The fee to be charged per ton of pollutant will be available from the department by June 1 of each year. The Responsible Official will be advised of any change in the annual fee per ton of pollutant.
- 3. The emissions inventory shall be submitted annually by March 31 with forms specified by the department documenting actual emissions for the previous calendar year.
- 4. The fee shall be submitted annually by July 1 with forms specified by the department.
- 5. If there are any changes to the emission calculation form, the department shall make revised forms available to the public by January 1. If revised forms are not available by January 1, forms from the previous year may be used and the year of emissions documented changed. The department shall calculate the total statewide Title V emissions for the prior calendar year and make this information available to the public no later than April 30 of each year.
- 6. Phase I acid rain affected units under section 404 of the Act shall not be required to pay a fee for emissions which occur during the years 1993 through 1999 inclusive.
- 7. The fee for a portable emissions unit or stationary source which operates both in Iowa and out of state shall be calculated only for emissions from the source while operating in Iowa.
- 8. Failure to pay the appropriate Title V fee represents cause for revocation of the Title V permit as indicated in 567 IAC 24.115(1)"d".

## G7. Inspection of Premises, Records, Equipment, Methods and Discharges

Upon presentation of proper credentials and any other documents as may be required by law, the permittee shall allow the director or the director's authorized representative to:

- 1. Enter upon the permittee's premises where a Title V source is located or emissions-related activity is conducted, or where records must be kept under the conditions of the permit;
- 2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of the permit;
- 3. Inspect, at reasonable times, any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under the permit; and
- 4. Sample or monitor, at reasonable times, substances or parameters for the purpose of ensuring compliance with the permit or other applicable requirements. 567 IAC 24.108 (15)"b"

# **G8. Duty to Provide Information**

The permittee shall furnish to the director, within a reasonable time, any information that the director may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee also shall furnish to the director copies of records required to be kept by the permit, or for information claimed to be confidential, the permittee shall furnish such records directly to the administrator of EPA along with a claim of confidentiality. 567 IAC 24.108 (9)"e"

# **G9.** General Maintenance and Repair Duties

The owner or operator of any air emission source or control equipment shall:

- 1. Maintain and operate the equipment or control equipment at all times in a manner consistent with good practice for minimizing emissions.
- 2. Remedy any cause of excess emissions in an expeditious manner.
- 3. Minimize the amount and duration of any excess emission to the maximum extent possible during periods of such emissions. These measures may include but not be limited to the use of clean fuels, production cutbacks, or the use of alternate process units or, in the case of utilities, purchase of electrical power until repairs are completed.
- 4. Schedule, at a minimum, routine maintenance of equipment or control equipment during periods of process shutdowns to the maximum extent possible. 567 IAC 21.8(1)

# G10. Recordkeeping Requirements for Compliance Monitoring

- 1. In addition to any source specific recordkeeping requirements contained in this permit, the permittee shall maintain the following compliance monitoring records, where applicable:
  - a. The date, place and time of sampling or measurements
  - b. The date the analyses were performed.
  - c. The company or entity that performed the analyses.
  - d. The analytical techniques or methods used.
  - e. The results of such analyses; and
  - f. The operating conditions as existing at the time of sampling or measurement.
  - g. The records of quality assurance for continuous compliance monitoring systems (including but not limited to quality control activities, audits and calibration drifts.)
- 2. The permittee shall retain records of all required compliance monitoring data and support information for a period of at least 5 years from the date of compliance monitoring sample, measurement report or application. Support information includes all calibration and maintenance records and all original strip chart recordings for continuous compliance monitoring, and copies of all reports required by the permit.

- 3. For any source which in its application identified reasonably anticipated alternative operating scenarios, the permittee shall:
  - a. Comply with all terms and conditions of this permit specific to each alternative scenario.
  - b. Maintain a log at the permitted facility of the scenario under which it is operating.
  - c. Consider the permit shield, if provided in this permit, to extend to all terms and conditions under each operating scenario. 567 IAC 24.108(4), 567 IAC 24.108(12)

# G11. Evidence used in establishing that a violation has or is occurring.

Notwithstanding any other provisions of these rules, any credible evidence may be used for the purpose of establishing whether a person has violated or is in violation of any provisions herein.

1. Information from the use of the following methods is presumptively credible evidence of whether a violation has occurred at a source:

- a. A monitoring method approved for the source and incorporated in an operating permit pursuant to 567 Chapter 24;
- b. Compliance test methods specified in 567 Chapter 21; or
- c. Testing or monitoring methods approved for the source in a construction permit issued pursuant to 567 Chapter 22.
- 2. The following testing, monitoring or information gathering methods are presumptively credible testing, monitoring, or information gathering methods:
  - a. Any monitoring or testing methods provided in these rules; or
  - b. Other testing, monitoring, or information gathering methods that produce information comparable to that produced by any method in subrule 21.5(1) or this subrule. 567 IAC 21.5(1)-567 IAC 21.5(2)

# G12. Prevention of Accidental Release: Risk Management Plan Notification and Compliance Certification

If the permittee is required to develop and register a risk management plan pursuant to section 112(r) of the Act, the permittee shall notify the department of this requirement. The plan shall be filed with all appropriate authorities by the deadline specified by EPA. A certification that this risk management plan is being properly implemented shall be included in the annual compliance certification of this permit. 567 IAC 24.108(6)

#### G13. Hazardous Release

The permittee must report any situation involving the actual, imminent, or probable release of a hazardous substance into the atmosphere which, because of the quantity, strength and toxicity of the substance, creates an immediate or potential danger to the public health, safety or to the environment. A verbal report shall be made to the department at (515) 725-8694 and to the local police department or the office of the sheriff of the affected county as soon as possible but not later than six hours after the discovery or onset of the condition. This verbal report must be followed up with a written report as indicated in 567 IAC 131.2(2). 567 IAC Chapter 131-State Only

## G14. Excess Emissions and Excess Emissions Reporting Requirements

1. Excess Emissions. Excess emission during a period of startup, shutdown, or cleaning of control equipment is not a violation of the emission standard if the startup, shutdown or cleaning is accomplished expeditiously and in a manner consistent with good practice for minimizing emissions. Cleaning of control equipment which does not require the shutdown of the process equipment shall be limited to one six-minute period per one-hour period. An incident of excess emission (other than an incident during startup, shutdown or cleaning of control equipment) is a

violation. If the owner or operator of a source maintains that the incident of excess emission was due to a malfunction, the owner or operator must show that the conditions which caused the incident of excess emission were not preventable by reasonable maintenance and control measures. Determination of any subsequent enforcement action will be made following review of this report. If excess emissions are occurring, either the control equipment causing the excess emission shall be repaired in an expeditious manner or the process generating the emissions shall be shutdown within a reasonable period of time. An expeditious manner is the time necessary to determine the cause of the excess emissions and to correct it within a reasonable period of time. A reasonable period of time is eight hours plus the period of time required to shut down the process without damaging the process equipment or control equipment. A variance from this subrule may be available as provided for in Iowa Code section 455B.143. In the case of an electric utility, a reasonable period of time is eight hours plus the period of time until comparable generating capacity is available to meet consumer demand with the affected unit out of service, unless, the director shall, upon investigation, reasonably determine that continued operation constitutes an unjustifiable environmental hazard and issue an order that such operation is not in the public interest and require a process shutdown to commence immediately.

#### 2. Excess Emissions Reporting

- a. Initial Reporting of Excess Emissions. An incident of excess emission (other than an incident of excess emission during a period of startup, shutdown, or cleaning) shall be reported to the appropriate field office of the department within eight hours of, or at the start of the first working day following the onset of the incident. The reporting exemption for an incident of excess emission during startup, shutdown or cleaning does not relieve the owner or operator of a source with continuous monitoring equipment of the obligation of submitting reports required in 567-subrule 21.10(6). An initial report of excess emission is not required for a source with operational continuous monitoring equipment (as specified in 567-subrule 21.10(1)) if the incident of excess emission continues for less than 30 minutes and does not exceed the applicable emission standard by more than 10 percent or the applicable visible emission standard by more than 10 percent opacity. The initial report may be made by electronic mail (E-mail), in person, or by telephone and shall include as a minimum the following:
  - i. The identity of the equipment or source operation from which the excess emission originated and the associated stack or emission point.
  - ii. The estimated quantity of the excess emission.
  - iii. The time and expected duration of the excess emission.
  - iv. The cause of the excess emission.
  - v. The steps being taken to remedy the excess emission.
  - vi. The steps being taken to limit the excess emission in the interim period.
- b. Written Reporting of Excess Emissions. A written report of an incident of excess emission shall be submitted as a follow-up to all required initial reports to the department within seven days of the onset of the upset condition, and shall include as a minimum the following:
  - i. The identity of the equipment or source operation point from which the excess emission originated and the associated stack or emission point.
  - ii. The estimated quantity of the excess emission.
  - iii. The time and duration of the excess emission.
  - iv. The cause of the excess emission.

- v. The steps that were taken to remedy and to prevent the recurrence of the incident of excess emission.
- vi. The steps that were taken to limit the excess emission.
- vii. If the owner claims that the excess emission was due to malfunction, documentation to support this claim. 567 IAC 21.7(1)-567 IAC 21.7(4)

# **G15. Permit Deviation Reporting Requirements**

A deviation is any failure to meet a term, condition or applicable requirement in the permit. Reporting requirements for deviations that result in a hazardous release or excess emissions have been indicated above (see G13 and G14). Unless more frequent deviation reporting is specified in the permit, any other deviation shall be documented in the semi-annual monitoring report and the annual compliance certification (see G4 and G5). 567 IAC 24.108(5)"b"

# **G16.** Notification Requirements for Sources That Become Subject to NSPS and NESHAP Regulations

During the term of this permit, the permittee must notify the department of any source that becomes subject to a standard or other requirement under 567-subrule 23.1(2) (standards of performance of new stationary sources) or section 111 of the Act; or 567-subrule 23.1(3) (emissions standards for hazardous air pollutants), 567-subrule 23.1(4) (emission standards for hazardous air pollutants for source categories) or section 112 of the Act. This notification shall be submitted in writing to the department pursuant to the notification requirements in 40 CFR Section 60.7, 40 CFR Section 61.07, and/or 40 CFR Section 63.9. 567 IAC 23.1(2), 567 IAC 23.1(4)

# G17. Requirements for Making Changes to Emission Sources That Do Not Require Title V Permit Modification

- 1. Off Permit Changes to a Source. Pursuant to section 502(b)(10) of the CAAA, the permittee may make changes to this installation/facility without revising this permit if:
  - a. The changes are not major modifications under any provision of any program required by section 110 of the Act, modifications under section 111 of the act, modifications under section 112 of the act, or major modifications as defined in 567 IAC Chapter 24.
  - b. The changes do not exceed the emissions allowable under the permit (whether expressed therein as a rate of emissions or in terms of total emissions);
  - c. The changes are not modifications under any provisions of Title I of the Act and the changes do not exceed the emissions allowable under the permit (whether expressed therein as a rate of emissions or as total emissions);
  - d. The changes are not subject to any requirement under Title IV of the Act (revisions affecting Title IV permitting are addressed in rules 567—24.140(455B) through 567 24.144(455B));.
  - e. The changes comply with all applicable requirements.
  - f. For each such change, the permitted source provides to the department and the administrator by certified mail, at least 30 days in advance of the proposed change, a written notification, including the following, which must be attached to the permit by the source, the department and the administrator:
    - i. A brief description of the change within the permitted facility,
    - ii. The date on which the change will occur,
    - iii. Any change in emission as a result of that change,
    - iv. The pollutants emitted subject to the emissions trade
    - v. If the emissions trading provisions of the state implementation plan are

invoked, then Title V permit requirements with which the source shall comply; a description of how the emissions increases and decreases will comply with the terms and conditions of the Title V permit.

- vi. A description of the trading of emissions increases and decreases for the purpose of complying with a federally enforceable emissions cap as specified in and in compliance with the Title V permit; and
- vii. Any permit term or condition no longer applicable as a result of the change. 567 IAC 24.110(1)
- 2. Such changes do not include changes that would violate applicable requirements or contravene federally enforceable permit terms and conditions that are monitoring (including test methods), record keeping, reporting, or compliance certification requirements. 567 IAC 24.110(2)
- 3. Notwithstanding any other part of this rule, the director may, upon review of a notice, require a stationary source to apply for a Title V permit if the change does not meet the requirements of subrule 24.110(1). 567 IAC 24.110(3)
- 4. The permit shield provided in subrule 24.108(18) shall not apply to any change made pursuant to this rule. Compliance with the permit requirements that the source will meet using the emissions trade shall be determined according to requirements of the state implementation plan authorizing the emissions trade. 567 IAC 24.110(4)
- 5. No permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes, for changes that are provided for in this permit. 567 IAC 24.108(11)

# G18. Duty to Modify a Title V Permit

- 1. Administrative Amendment.
  - a. An administrative permit amendment is a permit revision that does any of the following:
    - i. Correct typographical errors
    - ii. Identify a change in the name, address, or telephone number of any person identified in the permit, or provides a similar minor administrative change at the source;
    - iii. Require more frequent monitoring or reporting by the permittee; or iv. Allow for a change in ownership or operational control of a source where the director determines that no other change in the permit is necessary, provided that a written agreement containing a specific date for transfer of permit responsibility, coverage and liability between the current and new permittee has been submitted to the director.
  - b. The permittee may implement the changes addressed in the request for an administrative amendment immediately upon submittal of the request. The request shall be submitted to the director.
  - c. Administrative amendments to portions of permits containing provisions pursuant to Title IV of the Act shall be governed by regulations promulgated by the administrator under Title IV of the Act.
- 2. Minor Title V Permit Modification.
  - a. Minor Title V permit modification procedures may be used only for those permit modifications that satisfy all of the following:

- i. Do not violate any applicable requirement;
- ii. Do not involve significant changes to existing monitoring, reporting or recordkeeping requirements in the Title V permit;
- iii. Do not require or change a case by case determination of an emission limitation or other standard, or an increment analysis;
- iv. Do not seek to establish or change a permit term or condition for which there is no corresponding underlying applicable requirement and that the source has assumed in order to avoid an applicable requirement to which the source would otherwise be subject. Such terms and conditions include any federally enforceable emissions caps which the source would assume to avoid classification as a modification under any provision under Title I of the Act; and an alternative emissions limit approved pursuant to regulations promulgated under section 112(i)(5) of the Act;
- v. Are not modifications under any provision of Title I of the Act; and vi. Are not required to be processed as significant modification under rule 567 24.113(455B).
- b. An application for minor permit revision shall be on the minor Title V modification application form and shall include at least the following:
  - i. A description of the change, the emissions resulting from the change, and any new applicable requirements that will apply if the change occurs;
  - ii. The permittee's suggested draft permit;
  - iii. Certification by a responsible official, pursuant to 567 IAC 24.107(4), that the proposed modification meets the criteria for use of minor permit modification procedures and a request that such procedures be used; and
  - iv. Completed forms to enable the department to notify the administrator and the affected states as required by 567 IAC 24.107(7).
- c. The permittee may make the change proposed in its minor permit modification application immediately after it files the application. After the permittee makes this change and until the director takes any of the actions specified in 567 IAC 24.112(4) "a" to "c", the permittee must comply with both the applicable requirements governing the change and the proposed permit terms and conditions. During this time, the permittee need not comply with the existing permit terms and conditions it seeks to modify. However, if the permittee fails to comply with its proposed permit terms and conditions during this time period, the existing permit terms and conditions it seeks to modify may be enforced against the facility.
- 3. Significant Title V Permit Modification.

Significant Title V modification procedures shall be used for applications requesting Title V permit modifications that do not qualify as minor Title V modifications or as administrative amendments. These include but are not limited to all significant changes in monitoring permit terms, every relaxation of reporting or recordkeeping permit terms, and any change in the method of measuring compliance with existing requirements. Significant Title V modifications shall meet all requirements of 567 IAC Chapter 24, including those for applications, public participation, review by affected states, and review by the administrator, as those requirements that apply to Title V issuance and renewal.

The permittee shall submit an application for a significant permit modification not later than three months after commencing operation of the changed source unless the existing Title V

permit would prohibit such construction or change in operation, in which event the operation of the changed source may not commence until the department revises the permit. 567 IAC 24.111-567 IAC 24.113

# **G19. Duty to Obtain Construction Permits**

Unless exempted in 567 IAC 22.1(2) or to meet the parameters established in 567 IAC 22.1(1)"c", the permittee shall not construct, install, reconstruct or alter any equipment, control equipment or anaerobic lagoon without first obtaining a construction permit, or conditional permit, or permit pursuant to rule 567 IAC 22.8, or permits required pursuant to rules 567 IAC 22.4, 567 IAC 22.5, 567 IAC 31.3, and 567 IAC 33.3 as required in 567 IAC 22.1(1). A permit shall be obtained prior to the initiation of construction, installation or alteration of any portion of the stationary source or anaerobic lagoon. 567 IAC 22.1(1)

#### G20. Asbestos

The permittee shall comply with 567 IAC 23.1(3)"a", and 567 IAC 23.2(3)"g" when activities involve asbestos mills, surfacing of roadways, manufacturing operations, fabricating, insulating, waste disposal, spraying applications, demolition and renovation operations (567 IAC 23.1(3)"a"); training fires and controlled burning of a demolished building (567 IAC 23.2).

#### **G21.** Open Burning

The permittee is prohibited from conducting open burning, except as provided in 567 IAC 23.2. 567 IAC 23.2 <u>except</u> 23.2(3)"j"; 567 IAC 23.2(3)"j" - State Only

# G22. Acid Rain (Title IV) Emissions Allowances

The permittee shall not exceed any allowances that it holds under Title IV of the Act or the regulations promulgated there under. Annual emissions of sulfur dioxide in excess of the number of allowances to emit sulfur dioxide held by the owners and operators of the unit or the designated representative of the owners and operators is prohibited. Exceedances of applicable emission rates are prohibited. "Held" in this context refers to both those allowances assigned to the owners and operators by USEPA, and those allowances supplementally acquired by the owners and operators. The use of any allowance prior to the year for which it was allocated is prohibited. Contravention of any other provision of the permit is prohibited. 567 IAC 24.108(7)

# **G23.** Stratospheric Ozone and Climate Protection (Title VI) Requirements

- 1. The permittee shall comply with the standards for labeling of products using ozone-depleting substances pursuant to 40 CFR Part 82, Subpart E:
  - a. All containers in which a class I or class II substance is stored or transported, all products containing a class I substance, and all products directly manufactured with a class I substance must bear the required warning statement if it is being introduced into interstate commerce pursuant to § 82.106.
  - b. The placement of the required warning statement must comply with the requirements pursuant to § 82.108.
  - c. The form of the label bearing the required warning statement must comply with the requirements pursuant to § 82.110.
  - d. No person may modify, remove, or interfere with the required warning statement except as described in § 82.112.
- 2. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F, except as provided for MVACs in Subpart B:
  - a. Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to § 82.156.
  - b. Equipment used during the maintenance, service, repair, or disposal of appliances must

- comply with the standards for recycling and recovery equipment pursuant to § 82.158.
- c. Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to § 82.161.
- d. Persons disposing of small appliances, MVACs, and MVAC-like appliances must comply with reporting and recordkeeping requirements pursuant to § 82.166. ("MVAC-like appliance" as defined at § 82.152)
- e. Persons owning commercial or industrial process refrigeration equipment must comply with the leak repair requirements pursuant to § 82.156.
- f. Owners/operators of appliances normally containing 50 or more pounds of refrigerant must keep records of refrigerant purchased and added to such appliances pursuant to § 82.166.
- 3. If the permittee manufactures, transforms, imports, or exports a class I or class II substance, the permittee is subject to all the requirements as specified in 40 CFR part 82, Subpart A, Production and Consumption Controls.
- 4. If the permittee performs a service on motor (fleet) vehicles when this service involves ozone-depleting substance refrigerant (or regulated substitute substance) in the motor vehicle air conditioner (MVAC), the permittee is subject to all the applicable requirements as specified in 40 CFR part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners. The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed. The term "MVAC" as used in Subpart B does not include the air-tight sealed refrigeration system used as refrigerated cargo, or system used on passenger buses using HCFC-22 refrigerant,
- 5. The permittee shall be allowed to switch from any ozone-depleting or greenhouse gas generating substances to any alternative that is listed in the Significant New Alternatives Program (SNAP) promulgated pursuant to 40 CFR part 82, Subpart G, Significant New Alternatives Policy Program. 40 CFR part 82

## **G24. Permit Reopenings**

- 1. This permit may be modified, revoked, reopened, and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition. 567 IAC 24.108(9)"c"
- 2. Additional applicable requirements under the Act become applicable to a major part 70 source with a remaining permit term of 3 or more years. Revisions shall be made as expeditiously as practicable, but not later than 18 months after the promulgation of such standards and regulations.
  - a. Reopening and revision on this ground is <u>not</u> required if the permit has a remaining term of less than three years;
  - b. Reopening and revision on this ground is <u>not</u> required if the effective date of the requirement is later than the date on which the permit is due to expire, unless the original permit or any of its terms and conditions have been extended pursuant to 40 CFR 70.4(b)(10)(i) or (ii) as amended to May 15, 2001.
  - c. Reopening and revision on this ground is <u>not</u> required if the additional applicable requirements are implemented in a general permit that is applicable to the source and the source receives approval for coverage under that general permit. 567 IAC 24.108(17)"a", 567 IAC 24.108(17)"b"
- 3. A permit shall be reopened and revised under any of the following circumstances:

- a. The department receives notice that the administrator has granted a petition for disapproval of a permit pursuant to 40 CFR 70.8(d) as amended to July 21, 1992, provided that the reopening may be stayed pending judicial review of that determination; b. The department or the administrator determines that the Title V permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of the Title V permit;
- c. Additional applicable requirements under the Act become applicable to a Title V source, provided that the reopening on this ground is not required if the permit has a remaining term of less than three years, the effective date of the requirement is later than the date on which the permit is due to expire, or the additional applicable requirements are implemented in a general permit that is applicable to the source and the source receives approval for coverage under that general permit. Such a reopening shall be complete not later than 18 months after promulgation of the applicable requirement.
- d. Additional requirements, including excess emissions requirements, become applicable to a Title IV affected source under the acid rain program. Upon approval by the administrator, excess emissions offset plans shall be deemed to be incorporated into the permit.
- e. The department or the administrator determines that the permit must be revised or revoked to ensure compliance by the source with the applicable requirements. 567 IAC 24.114(1)
- 4. Proceedings to reopen and reissue a Title V permit shall follow the procedures applicable to initial permit issuance and shall effect only those parts of the permit for which cause to reopen exists. 567 IAC 24.114(2)
- 5. A notice of intent shall be provided to the Title V source at least 30 days in advance of the date the permit is to be reopened, except that the director may provide a shorter time period in the case of an emergency. 567 IAC 24.114(3)

#### **G25. Permit Shield**

- 1. The director may expressly include in a Title V permit a provision stating that compliance with the conditions of the permit shall be deemed compliance with any applicable requirements as of the date of permit issuance, provided that:
  - a. Such applicable requirements are included and are specifically identified in the permit; or
  - b. The director, in acting on the permit application or revision, determines in writing that other requirements specifically identified are not applicable to the source, and the permit includes the determination or a concise summary thereof.
- 2. A Title V permit that does not expressly state that a permit shield exists shall be presumed not to provide such a shield.
- 3. A permit shield shall not alter or affect the following:
  - a. The provisions of Section 303 of the Act (emergency orders), including the authority of the administrator under that section;
  - b. The liability of an owner or operator of a source for any violation of applicable requirements prior to or at the time of permit issuance;
  - c. The applicable requirements of the acid rain program, consistent with Section 408(a) of the Act:
  - d. The ability of the department or the administrator to obtain information from the facility pursuant to Section 114 of the Act. 567 IAC 24.108 (18)

#### **G26.** Severability

The provisions of this permit are severable and if any provision or application of any provision is found to be invalid by this department or a court of law, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected by such finding. 567 IAC 24.108 (8)

## **G27. Property Rights**

The permit does not convey any property rights of any sort, or any exclusive privilege. 567 IAC 24.108 (9)"d"

#### **G28.** Transferability

This permit is not transferable from one source to another. If title to the facility or any part of it is transferred, an administrative amendment to the permit must be sought consistent with the requirements of 567 IAC 24.111(1). 567 IAC 24.111(1)"d"

#### G29. Disclaimer

No review has been undertaken on the engineering aspects of the equipment or control equipment other than the potential of that equipment for reducing air contaminant emissions. 567 IAC 24.3(3)"c"

G30. Notification and Reporting Requirements for Stack Tests or Monitor Certification The permittee shall notify the department's stack test contact in writing not less than 30 days before a required test or performance evaluation of a continuous emission monitor is performed to determine compliance with applicable requirements of 567 – Chapter 23 or a permit condition. Such notice shall include the time, the place, the name of the person who will conduct the test and other information as required by the department. If the owner or operator does not provide timely notice to the department, the department shall not consider the test results or performance evaluation results to be a valid demonstration of compliance with applicable rules or permit conditions. Upon written request, the department may allow a notification period of less than 30 days. At the department's request, a pretest meeting shall be held not later than 15 days prior to conducting the compliance demonstration. A testing protocol shall be submitted to the department no later than 15 days before the owner or operator conducts the compliance demonstration. A representative of the department shall be permitted to witness the tests. Results of the tests shall be submitted in writing to the department's stack test contact in the form of a comprehensive report within six weeks (42 days) of the completion of the testing. Compliance tests conducted pursuant to this permit shall be conducted with the source operating in a normal manner at its maximum continuous output as rated by the equipment manufacturer, or the rate specified by the owner as the maximum production rate at which the source shall be operated. In cases where compliance is to be demonstrated at less than the maximum continuous output as rated by the equipment manufacturer, and it is the owner's intent to limit the capacity to that rating, the owner may submit evidence to the department that the source has been physically altered so that capacity cannot be exceeded, or the department may require additional testing, continuous monitoring, reports of operating levels, or any other information deemed necessary by the department to determine whether such source is in compliance.

Stack test notifications, reports and correspondence shall be sent to:

Stack Test Review Coordinator Iowa DNR, Air Quality Bureau 6200 Park Ave Suite 200

Des Moines, IA 50321

(515) 343-6589

Within Polk and Linn Counties, stack test notifications, reports and correspondence shall also be directed to the supervisor of the respective county air pollution program.

567 IAC 21.10(7)"a", 567 IAC 21.10(9)

## G31. Prevention of Air Pollution Emergency Episodes

The permittee shall comply with the provisions of 567 IAC Chapter 26 in the prevention of excessive build-up of air contaminants during air pollution episodes, thereby preventing the occurrence of an emergency due to the effects of these contaminants on the health of persons. 567 IAC 26.1(1)

#### **G32.** Contacts List

The current address and phone number for reports and notifications to the EPA administrator is:

Iowa Compliance Officer

Air Branch

Enforcement and Compliance Assurance Division

U.S. EPA Region 7

11201 Renner Blvd.

Lenexa, KS 66219

(913) 551-7020

The current address and phone number for reports and notifications to the department or the Director is:

Chief, Air Quality Bureau

Iowa Department of Natural Resources

6200 Park Ave

Suite 200

Des Moines, IA 50321

(515) 313-8325

Reports or notifications to the DNR Field Offices or local programs shall be directed to the supervisor at the appropriate field office or local program. Current addresses and phone numbers are:

#### Field Office 1

1101 Commercial Court, Suite 10 Manchester, IA 52057 (563) 927-2640

#### Field Office 3

1900 N. Grand Ave. Spencer, IA 51301 (712) 262-4177

#### Field Office 5

6200 Park Ave Suite 200 Des Moines, IA 50321 (515) 725-0268

#### **Polk County Public Works Dept.**

Air Quality Division 5885 NE 14th St. Des Moines, IA 50313 (515) 286-3351

#### Field Office 2

2300-15th St., SW Mason City, IA 50401 (641) 424-4073

#### Field Office 4

1401 Sunnyside Lane Atlantic, IA 50022 (712) 243-1934

#### Field Office 6

1023 West Madison Street Washington, IA 52353-1623 (319) 653-2135

### **Linn County Public Health**

Air Quality Branch 1020 6<sup>th</sup> Street SE Cedar Rapids, IA 52401 (319) 892-6000

## V. Appendix A

- A. 40 CFR Part 60 Subpart A General Provisions https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-A
- B. 40 CFR Part 60 Subpart Db –Standards of Performance for Industrial, Commercial, Institutional Steam Generating Unit <a href="https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-Db">https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-Db</a>
- C. 40 CFR Part 60 Subpart Dc Standards of Performance for Small Industrial, Commercial, and Institutional Steam Generating Unit <a href="https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-Dc">https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-Dc</a>
- D. 40 CFR Part 60 Subpart DD Standards of Performance for Grain Elevators <a href="https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-DD">https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-60/subpart-DD</a>
- E. 40 CFR Part 63 Subpart A General Provision <a href="https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-63/subpart-A">https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-63/subpart-A</a>
- F. 40 CFR Part 63 Subpart GGGG National Emission Standard for Hazardous Air Pollutants: Solvent Extractions for Vegetable Oil Production <a href="https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-63/subpart-GGGG">https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-63/subpart-GGGG</a>
- H. 40 CFR Part 61 Subpart M National Emission Standard for Asbestos https://www.ecfr.gov/current/title-40/chapter-I/subchapter-C/part-61/subpart-M

# V. Appendix B Executive Order EO-10 Rules Crosswalk

<b>Previous Chapter</b>	Current	Previous Title and	Current Title and	Actions Taken
Number (Prior to	Chapter	Description (Prior to 5/15/2024)	Description	
5/15/2024)	Number	, , , , , , , , , , , , , , , , , , , ,		
20	20 (Reserved)	Scope of Title - Definitions	N/A	Definitions moved to Ch. 21, 22 and 23.
				Rescinded Ch. 20. (Reserved)
21	21	Compliance	Compliance, Excess Emissions, and	<b>Kept and combined</b> with rules from Chapters 24, 25, 26, and 29.
			Measurement of Emissions	
22	22	Controlling Pollution-Permits	Controlling Air Pollution - Construction	Kept construction permit rules and combined with Ch. 20 (definitions) and Ch. 28 (NAAQS).
			Permitting	
				Moved operating permit rules to Chapter 24.
22.100 - 22.300(12)	(New) 24	N/A	Operating Permits	Moved operating permit rules from Ch. 22 to Ch. 24.
23	23	Emission Standards	Air Emission Standards	Kept
24	(New) 21	Excess Emissions	Compliance, Excess Emissions, and	Moved rules and combined with Ch. 21.
			Measurement of Emissions	
				Moved TV rules here (to Ch. 24).
25	(New) 21	Emissions Measurement	Compliance, Excess Emissions, and	Moved rules and combined with Ch. 21.
			Measurement of Emissions	
				Rescinded Ch. 25. (Reserved)
26	(New) 21	Emergency Air Pollution Episodes	Compliance, Excess Emissions, and	Moved rules and combined with Ch. 21.
			Measurement of Emissions	
				Rescinded Ch. 26. (Reserved)
27	27	Local Program Acceptance	Local Program Acceptance	Kept
28	22	NAAQS	N/A	Moved rules and combined with Ch. 22.
				Rescinded Ch. 28. (Reserved)
29	(New) 21	Opacity Qualifications	Compliance, Excess Emissions, and	Moved rules and combined with Ch. 21.
			Measurement of Emissions	
				Rescinded Ch. 29. (Reserved)
30	30	Fees	Fee	Kept
31	31	Nonattainment Areas	Nonattainment New Source Review	Kept
32	N/A	AFO Field Study	N/A	Rescinded Ch. 32. (Reserved)
33	33	Special regulations and construction permit		Kept
		requirements for major stationary	stationary sources—Prevention of significant	
		sources—Prevention of significant	deterioration (PSD)	
		deterioration (PSD) of air quality		
34	N/A	Emissions Trading-CAIR-CAMR	N/A	Rescinded Ch. 34. (Reserved)
35	N/A	Grant Assistance Programs	N/A	Rescinded Ch. 35. (Reserved)

1

Number (Prior to	Chapter		Current Title and Description	Actions Taken
5/15/2024)	Number			
20	20 (Reserved)	Scope of Title - Definitions	N/A	Definitions moved to Ch. 21, 22 and 23.
				Rescinded Ch. 20. (Reserved)
20.1	N/A	Scope of title	N/A	
20.2	Ch. 21, 22, 23	Definitions	Definitions	See beginning of Ch. 21, 22, and 23
20.3	N/A	Air quality forms generally	N/A	

21	21	Compliance	Compliance, Excess Emissions, and	Kept and combined with rules from Chapters 24, 25, 26, and 29.
			Measurement of Emissions	
21.1	21.1	Compliance Schedule	Definitions and compliance requirements	Added definitions from Ch. 21, some language updated
21.2	21.2	Variances	Variances	Some language updated
21.3	21.3	Emission reduction program	Reserved	Reserved
21.4	21.4	Circumvention of rules	Circumvention of rules	Minor language updated
21.5	21.5	Evidence used in establishing that a violation has	Evidence used in establishing that a violation has	21.5(2) Reserved, some language updated
		or is occurring	occurred or is occurring	
21.6	21.6	Temporary electricity generation for disaster	Temporary electricity generation for disaster	Minor language updated
		situations	situations	
24.1	21.7	Excess emission reporting	Excess emission reporting	Moved from Ch. 24, some language updated
24.2	21.8	Maintenance and repair requirements	Maintenance and repair requirements	Moved from Ch. 24, some language updated
N/A	21.9	N/A	Compliance with other requirements	New language
25.1	21.10	Testing and sampling of new and existing	Testing and sampling of new and existing	Moved from Ch. 25, some language updated
		equipment	equipment	
25.2	21.11	Continuous emission monitoring under the acid	Continuous emission monitoring under the acid	Moved from Ch. 25, some language updated
		rain program	rain program	
25.3	N/A	Mercury emissions testing and monitoring	N/A	Rescinded. Except 25.3(5)
25.3(5)	21.12	Affected sources subject to Section 112(g)	Affected sources subject to Section 112(g)	Moved from Ch. 25, some language updated
29.1	21.13	Methodology and qualified observer	Methodology and qualified observer	Moved from Ch. 29, some language updated
26.1	21.14	Prevention of air pollution emergency episodes -	Prevention of air pollution emergency episodes	Moved from Ch. 26, some language updated
		General		
26.2	21.15	Episode criteria	Episode criteria	Moved from Ch. 26, some language updated
26.3	21.16	Preplanned abatement strategies	Preplanned abatement strategies	Moved from Ch. 26, some language updated
26.4	21.17	Actions taken during episodes	Actions taken during episodes	Moved from Ch. 26, some language updated
Ch 26 Table III	Table I	Abatement strategies emission reduction actions	Abatement strategies emission reduction actions	Moved from Ch. 26, reference federal appendix table
		alert level	alert level	
Ch 26 Table IV	Table II	Abatement strategies emission reduction actions	Abatement strategies emission reduction actions	Moved from Ch. 26, reference federal appendix table
		warning level	warning level	
Ch 26 Table V	Table III	Abatement strategies emission reduction actions	Abatement strategies emission reduction actions	Moved from Ch. 26, reference federal appendix table
		emergency level	emergency level	

22	22	Controlling Pollution-Permits	Controlling Air Pollution - Construction	<b>Kept construction permit rules and combined</b> with Ch. 20 (definitions) and Ch. 28 (NAAQS).
			Permitting	
				Moved operating permit rules to Chapter 24.
22.1	22.1	Permits required for new or existing stationary	Definitions and permit requirements for new or	Added definitions from Ch. 20, some language updated
		sources	existing stationary sources	
22.2	22.2	Processing permit applications	Processing permit applications	
22.3	22.3	Issuing permits	Issuing permits	
22.4	22.4	Special requirements for major stationary	Major stationary sources located in areas	
		sources located in areas designated attainment	designated attainment or unclassified (PSD)	
		or unclassified (PSD)		
22.5	22.5	Special requirements for nonattainment areas	Major stationary sources located in areas	
			designated Nonattainment	
22.6	22.6	Nonattainment area designations	Reserved	

Number (Prior to	Current Chapter Number	Previous Title and Description (Prior to 5/15/2024)	Current Title and Description	Actions Taken
22.7	22.7	Alternative emission control program	Alternative emission control program	
22.8	22.8	Permit by rule	Permit by rule	
22.9	22.9	Special requirements for visibility protection	Special requirements for visibility protection	A lot of language updated or removed
22.10	22.10	elevators, country grain terminal elevators, grain	Permitting requirements for country grain elevators, country grain terminal elevators, grain terminal elevators and feed mill equipment	
28.1	22.11	Ambient air quality standards - Statewide standards	Ambient air quality standards	Moved from Ch. 28, minor language updated
22.12 to 22.99	N/A	Reserved	N/A	Removed

22.100 - 22.300(12)	(New) 24	N/A	Operating Permits	Moved operating permit rules from Ch. 22 to Ch. 24.
22.100	24.100	Definitions for Title V operating permits	Definitions for Title V operating permits	Moved from Ch. 22, some language updated, many 40 CFR 70 definitions adopted by reference
22.101	24.101	Applicability of Title V operating permit	Applicability of Title V operating permit	Moved from Ch. 22, some language updated to correct punctuation and remove old dates
		requirements	requirements	
22.102	24.102	Source category exemptions	Source category exemptions	Moved from Ch. 22, some language updated to correct punctuation
22.103	24.103	Insignificant activities	Insignificant activities	Moved from Ch. 22, some language updated to correct typos and remove old dates
22.104	24.104	Requirement to have a Title V permit	Requirement to have a Title V permit	Moved from Ch. 22, some language updated no changes to rule text
22.105	24.105	Title V permit applications	Title V permit applications	Moved from Ch. 22, updated language to address electronic submissions and remove past application due dates
22.106	24.106	Annual Title V emissions inventory	Annual Title V emissions inventory	Moved from Ch. 22, no changes to rule text
22.107	24.107	Title V permit processing procedures	Title V permit processing procedures	Moved from Ch. 22, some language updated to update locations of public records and remove old CFR amendment dates
22.108	24.108	Permit content	Permit content	Moved from Ch. 22, some language updated to correct punctuation, remove old dates, and adopt 40 CFR 70 rules by reference
22.109	24.109	General permits	General permits	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.110	24.110	Changes allowed without a Title V permit revision (off-permit revisions)	Changes allowed without a Title V permit revision (off-permit revisions)	Moved from Ch. 22, some language updated to remove redundant language
22.111	24.111		Administrative amendments to Title V permits	Moved from Ch. 22, no changes to rule text
22.112	24.112	Minor Title V permit modifications	Minor Title V permit modifications	Moved from Ch. 22, no changes to rule text
22.113	24.113	Significant Title V permit modifications	Significant Title V permit modifications	Moved from Ch. 22, no changes to rule text
22.114	24.114	Title V permit reopenings	Title V permit re-openings	Moved from Ch. 22 to Ch. 24, some language updated to adopt 40 CFR 70 rules by reference
22.115	24.115	Suspension, termination, and revocation of Title V permits	Suspension, termination, and revocation of Title V permits	Moved from Ch. 22, no changes to rule text
22.116	24.116	Title V permit renewals	Title V permit renewals	Moved from Ch. 22, no changes to rule text
22.117-22.119	24.117-24.119	Reserved	Reserved	Moved from Ch. 22, no changes to rule text
22.120	24.120	Acid rain program—definitions	Acid rain program—definitions	Moved from Ch. 22, some language updated to remove old CFR amendment dates and address electronic submissions
22.121	24.121	Measurements, abbreviations, and acronyms	Reserved	Moved from Ch. 22, no changes to rule text
22.122	24.122	Applicability	Applicability	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.123	24.123	Acid rain exemptions	Acid rain exemptions	Moved from Ch. 22, some language updated to correct punctuation
22.124	24.124	Retired units exemption	Reserved	Moved from Ch. 22, no changes to rule text
22.125	24.125	Standard requirements	Standard requirements	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.126	24.126	Designated representative—submissions	Designated representative—submissions	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.127	24.127	Designated representative—objections	Designated representative—objections	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.128	24.128	Acid rain applications—requirement to apply	Acid rain applications—requirement to apply	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference

3

22.129	24.129	Information requirements for acid rain permit	Information requirements for acid rain permit	Moved from Ch. 22, no changes to rule text
		applications	applications	
Previous Chapter	Current	Previous Title and	Current Title and	Actions Taken
Number (Prior to	Chapter	Description (Prior to 5/15/2024)	Description	
•		Description (1 1101 to 5) 15/2024)	Description	
5/15/2024)	Number			
22.130	24.130	Acid rain permit application shield and binding	Acid rain permit application shield and binding	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
		effect of permit application	effect of permit application	
22.131	24.131	Acid rain compliance plan and compliance	Acid rain compliance plan and compliance	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
		options—general	options—general	
22.132	24.132	Repowering extensions	Reserved	Moved from Ch. 22, no changes to rule text
22.133	24.133	Acid rain permit contents—general	Acid rain permit contents—general	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.134	24.134	Acid rain permit shield	Acid rain permit shield	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.135	24.135	Acid rain permit issuance procedures—general	Acid rain permit issuance procedures—general	Moved from Ch. 22, no changes to rule text
22.136	24.136	Acid rain permit issuance	Acid rain permit issuance	Moved from Ch. 22, no changes to rule text
22.427	24.427	procedures—completeness	procedures—completeness	March Con Ch. 22 and a control of the L
22.137	24.137	Acid rain permit issuance procedures—statement	Acid rain permit issuance procedures—statement	INIOVED From Cn. 22, no changes to rule text
22.422	24.422	of basis	of basis	
22.138	24.138	Issuance of acid rain permits	Issuance of acid rain permits	Moved from Ch. 22, some language updated to remove old dates and deadlines
22.139	24.139	Acid rain permit appeal procedures	Acid rain permit appeal procedures	Moved from Ch. 22, no changes to rule text
22.140	24.140	Permit revisions—general	Permit revisions—general	Moved from Ch. 22, some language updated to remove old dates
22.141	24.141	Permit modifications	Permit modifications	Moved from Ch. 22, no changes to rule text
22.142	24.142	Fast-track modifications	Fast-track modifications	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.143	24.143	Administrative permit amendment	Administrative permit amendment	Moved from Ch. 22, some language updated to remove fax option
22.144	24.144	Automatic permit amendment	Automatic permit amendment	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.145	24.145	Permit reopenings	Permit re-openings	Moved from Ch. 22, language updated to adopt 40 CFR 70 rules by reference
22.146	24.146	Compliance certification—annual report	Compliance certification—annual report	Moved from Ch. 22, no changes to rule text
22.147	24.147	Compliance certification—units with repowering extension plans	Reserved	Moved from Ch. 22, no changes to rule text
22.148	24.148	Sulfur dioxide opt-ins	Sulfur dioxide opt-ins	Moved from Ch. 22, some language updated to update the 40 CFR Part 74 amendment date
22.149 - 22.199	24.149 - 24.299	Reserved	Reserved	Moved from Ch. 22, no changes to rule text
22.200	24.200 - 24.299	Definitions for voluntary operating permits	Reserved	Moved from Ch. 22, no changes to rule text
22.201	24.200 - 24.299	Eligibility for voluntary operating permits	Reserved	Moved from Ch. 22, no changes to rule text
22.203	24.200 - 24.299	Voluntary operating permit applications	Reserved	Moved from Ch. 22, no changes to rule text
22.204	24.200 - 24.299	Voluntary operating permit fees	Reserved	Moved from Ch. 22, no changes to rule text
22.205	24.200 - 24.299	Voluntary operating permit processing procedures	Reserved	Moved from Ch. 22, no changes to rule text
22.206	24.200 - 24.299	Permit content	Reserved	Moved from Ch. 22, no changes to rule text
22.207	24.200 - 24.299	Relation to construction permits	Reserved	Moved from Ch. 22, no changes to rule text
22.208	24.200 - 24.299	Suspension, termination, and revocation of	Reserved	Moved from Ch. 22, no changes to rule text
		voluntary operating permits		
22.209	24.200 - 24.299	Change of ownership for facilities with voluntary	Reserved	Moved from Ch. 22, no changes to rule text
-		operating permits		,
22.210 - 22.299	24.200 - 24.299	Reserved	Reserved	Moved from Ch. 22, no changes to rule text
22.300	24.300	Operating permit by rule for small sources	Operating permit by rule for small sources	Moved from Ch. 22, no changes to rule text
	•	· · · · · · · · · · · · · · · · · · ·	·	
	1	Ended to Considerate	At agree to the agree of the advention	lu

23	23	Emission Standards	Air Emission Standards	Kept
23.1	23.1	Emission standards	Emission standards	Kept, language updated, tables used
23.2	23.2	Open burning	Open burning	Kept, some language updated
23.3	23.3	Specific contaminants	Specific contaminants	Kept, some language updated
23.4	23.4	Specific processes	Specific processes	Kept, some language updated
23.5	23.5	Anaerobic lagoons	Anaerobic lagoons	Kept, some language updated
23.6	23.6	Alternative emission limits (the "bubble	Reserved	Removed
		concept")		

AQB Rule Tracking Crossv	vaik			
Previous Chapter Number (Prior to 5/15/2024)	Current Chapter Number	Previous Title and Description (Prior to 5/15/2024)	Current Title and Description	Actions Taken
24	(New) 21	Excess Emissions	Compliance, Excess Emissions, and Measurement of Emissions	Moved rules and combined with Ch. 21.
				Moved operating permit rules here (to Ch. 24).
24.1	21.7	Excess emission reporting	Excess emission reporting	Moved from Ch. 24, some language updated
24.2	21.8	Maintenance and repair requirements	Maintenance and repair requirements	Moved from Ch. 24, some language updated
25	(New) 21	Emissions Measurement	Compliance, Excess Emissions, and Measurement of Emissions	Moved rules and combined with Ch. 21.
25.1	21.10	Testing and sampling of new and existing equipment	Testing and sampling of new and existing equipment	Rescinded Ch. 25. (Reserved)  Moved from Ch. 25, some language updated
25.2	21.11	Continuous emission monitoring under the acid rain program	Continuous emission monitoring under the acid rain program	Moved from Ch. 25, some language updated
25.3		Mercury emissions testing and monitoring	N/A	Rescinded. Except 25.3(5)
25.3(5)	21.12	Affected sources subject to Section 112(g)	Affected sources subject to Section 112(g)	Moved from Ch. 25, some language updated
26	(New) 21	Emergency Air Pollution Episodes	Compliance, Excess Emissions, and Measurement of Emissions	Moved rules and combined with Ch. 21.  Rescinded Ch. 26. (Reserved)
26.1	21.14	Prevention of air pollution emergency episodes - General	Prevention of air pollution emergency episodes	Moved from Ch. 26, some language updated
26.2	21.15	Episode criteria	Episode criteria	Moved from Ch. 26, some language updated
26.3	21.16	Preplanned abatement strategies	Preplanned abatement strategies	Moved from Ch. 26, some language updated
26.4	21.17	Actions taken during episodes	Actions taken during episodes	Moved from Ch. 26, some language updated
Ch 26 Table III	Table I	Abatement strategies emission reduction actions alert level	Abatement strategies emission reduction actions alert level	Moved from Ch. 26, reference federal appendix table
Ch 26 Table IV	Table II	Abatement strategies emission reduction actions warning level	Abatement strategies emission reduction actions warning level	Moved from Ch. 26, reference federal appendix table
Ch 26Table V	Table III	Abatement strategies emission reduction actions emergency level	Abatement strategies emission reduction actions emergency level	Moved from Ch. 26, reference federal appendix table
27	27	Local Program Acceptance	Local Program Acceptance	Kept
27.1	27.1	General	General	Kept, some language updated
27.2	27.2	Certificate of acceptance	Certificate of acceptance	Kept, some language updated
27.3	27.3	Ordinance or regulations	Ordinance or regulations	Kept, some language updated
27.4	27.4	Administrative organization	Administrative organization	Kept, some language updated
27.5	27.5	Program activities	Program activities	Kept, some language updated
28	22	NAAQS	N/A	Moved rules and combined with Ch. 22.
				Rescinded Ch. 28. (Reserved)
28.1	22.11	Ambient air quality standards - Statewide standards	Ambient air quality standards	Moved from Ch. 28, minor language updated  Rescinded Ch. 28. (Reserved)
29	(New) 21	Opacity Qualifications	Compliance, Excess Emissions, and Measurement of Emissions	Moved rules and combined with Ch. 21.
	1			Rescinded Ch. 29. (Reserved)
29.1	21.13	Methodology and qualified observer	Methodology and qualified observer	Moved from Ch. 29, some language updated

5

Previous Chapter	Current	Previous Title and	Current Title and	Actions Taken
•				ACTIONS Taken
Number (Prior to	Chapter	Description (Prior to 5/15/2024)	Description	
5/15/2024)	Number			
30	30	Fees	Fee	Kept
30.1	30.1	Purpose	Purpose	Kept, language updated
30.2	30.2	Fees associated with new source review	Fees associated with new source review	Kept, some language updated
30.2	30.2	applications	applications	Rept, some language apaated
30.3	30.3	Fees associated with asbestos demolition or	Fees associated with asbestos demolition or	Kept, some language updated
50.5	55.5	renovation notification	renovation notification	nepty some isinguage aparted
30.4	30.4	Fees associated with Title V operating permits	Fees associated with Title V operating permits	Kept, some language updated
		,		
30.5	30.5	Fee advisory groups	Fee advisory groups	Kept, language updated
30.6	30.6	Process to establish or adjust fees and	Process to establish or adjust fees and	Kept, some language updated
		notification of fee rates	notification of fee rates	
30.7	30.7	Fee revenue	Reserved	Language removed
31	31	Nonattainment Areas	Nonattainment New Source Review	Kept
31.1	31.1	Permit requirements relating to nonattainment	Permit requirements relating to nonattainment	Kept, some language updated
		areas	areas	
31.2	31.2	Conformity of general federal actions to the Iowa	Reserved	Language removed
		state implementation plan or federal		
		implementation plan - Rescinded		
31.3	31.3	Nonattainment new source review requirements	Nonattainment new source review (NNSR)	Kept, some language updated
		for areas designated nonattainment on or after	requirements for areas designated	
		May 18, 1998	nonattainment	
31.4	31.4	Preconstruction review permit program	Preconstruction review permit program	Kept
31.5 - 31.8	31.5 - 31.8	Reserved	Reserved	Kept
31.9	31.9	Actuals PALs	Actuals PALs	Kept, some language updated
31.10	31.10	Validity of rules	Validity of rules	Kept
31.11 - 31.19	N/A	Reserved	N/A	Rescinded and removed
31.20	N/A	Special requirements for nonattainment areas	N/A	Rescinded and removed
		designated before May 18, 1998		
32	N/A	AFO Field Study	N/A	Descinded Ch. 22 (Descriped)
	<u> </u>	AFO Field Study	-	Rescinded Ch. 32. (Reserved)
32.1	N/A	Animal feeding operations field study	N/A	Rescinded, reserved, and language removed
32.2 32.3	N/A N/A	Definitions	N/A N/A	Rescinded, reserved, and language removed
32.3	N/A	Exceedance of the health effects value (HEV) for	N/A	Rescinded, reserved, and language removed
32.4	N/A	hydrogen sulfide  Exceedance of the health effects standard (HES)	N/A	Rescinded, reserved, and language removed
32.4	IN/A	for hydrogen sulfide	IN/A	nescriueu, reserveu, and language removed
32.5	N/A	Iowa Air Sampling Manual	N/A	Rescinded, reserved, and language removed
32.3	IN/A	lowa Ali Sampinig Manuai	IN/A	nescribed, reserved, and ranguage removed
33	33	Special regulations and construction permit	Construction permit requirements for major	Kent
33	33	requirements for major stationary	stationary sources—Prevention of	пери
			· ·	
		sources—Prevention of significant	significant deterioration (PSD)	
		deterioration (PSD) of air quality	I_	
33.1	33.1	Purpose	Purpose	Kept, some language updated
33.2	33.2	Reserved	Reserved	Kept
33.3	33.3	Special construction permit requirements for	PSD construction permit requirements for major	Kept, some language updated
		major stationary sources in areas designated	stationary sources	
		attainment or unclassified (PSD)		
22.4. 22.0	22.4. 22.0	Decembed	Danamard .	V
33.4 - 33.8	33.4 - 33.8	Reserved	Reserved	Kept
33.9	33.9	Plantwide applicability limitations (PALs)	Plantwide applicability limitations (PALs)	Kept, some language updated
33.10 IRM 06/19/2024	33.10	Exceptions to adoption by reference	Exceptions to adoption by reference	Kept, some language updated

33.10 | 33.10 | Exceptions to adoption by reference | Exceptions to adoption by reference | Kept, some language updated | JRM 06/19/2024

<b>Previous Chapter</b>	Current	Previous Title and	Current Title and	Actions Taken
Number (Prior to	Chapter	Description (Prior to 5/15/2024)	Description	Testonia rancin
•	-	Description (Filor to 3/13/2024)	Description	
5/15/2024)	Number			
34	N/A	Emissions Trading-CAIR-CAMR	N/A	Rescinded Ch. 34. (Reserved)
34.1	N/A	Purpose	N/A	Rescinded, reserved, and language removed
34.2 - 34.199	N/A	Reserved	N/A	Rescinded, reserved, and language removed
34.200	N/A	Provisions for air emissions trading and other	N/A	Rescinded, reserved, and language removed
		requirements for the Clean Air Interstate Rule		
		(CAIR) - rescinded		
34.201	N/A	CAIR NOx annual trading program general	N/A	Rescinded, reserved, and language removed
		provisions - rescinded		
34.202	N/A	CAIR designated representative for CAIR NOx	N/A	Rescinded, reserved, and language removed
		sources - rescinded		
34.203	N/A	Permits - rescinded	N/A	Rescinded, reserved, and language removed
34.204	N/A	Reserved	N/A	Rescinded, reserved, and language removed
34.205	N/A	CAIR NOx allowance allocations - rescinded	N/A	Rescinded, reserved, and language removed
34.206	N/A	CAIR NOx allowance tracking system - rescinded	N/A	Rescinded, reserved, and language removed
24 207	N1 / A	CAID NO. allaware a transferration ded	N1/A	Descinded assessed and leaveners assessed
34.207 34.208	N/A N/A	CAIR NOx allowance transfers - rescinded	N/A N/A	Rescinded, reserved, and language removed
34.208	N/A N/A	Monitoring and reporting - rescinded	N/A	Rescinded, reserved, and language removed
34.209	N/A	CAIR NOx opt-in units - rescinded	N/A	Rescinded, reserved, and language removed
34.210	N/A	CAIR SO2 trading program - rescinded Reserved	N/A	Rescinded, reserved, and language removed
34.211 - 34.219	N/A	CAIR NOx ozone season trading program -	N/A	Rescinded, reserved, and language removed  Rescinded, reserved, and language removed
34.220	IN/A	rescinded	IN/A	Rescinded, reserved, and language removed
34.221	N/A	CAIR NOx ozone season trading program general	N/A	Rescinded, reserved, and language removed
		provisions - rescinded		
34.222	N/A	CAIR designated representative for CAIR NOx ozone season sources - rescinded	N/A	Rescinded, reserved, and language removed
34.223	N/A	CAIR NOx ozone season permits - rescinded	N/A	Rescinded, reserved, and language removed
34.224	N/A	Reserved	N/A	Rescinded, reserved, and language removed
34.225	N/A	CAIR NOx ozone season allowance allocations -	N/A	Rescinded, reserved, and language removed
	,	rescinded	,	
34.226	N/A	CAIR NOx ozone season allowance tracking	N/A	Rescinded, reserved, and language removed
		system - rescinded		
34.227	N/A	CAIR NOx ozone season allowance transfers -	N/A	Rescinded, reserved, and language removed
		rescinded		
34.228	N/A	CAIR NOx ozone season monitoring and reporting - rescinded	N/A	Rescinded, reserved, and language removed
34.229	N/A	CAIR NOx ozone season opt-in units - rescinded	N/A	Rescinded, reserved, and language removed
34.230 - 34.299	N/A	Reserved	N/A	Rescinded, reserved, and language removed
34.230 - 34.299	N/A N/A	Provisions for air emissions trading and other	N/A	Rescinded, reserved, and language removed
3500	14/4	requirements for the Clean Air Mercury Rule (CAMR) - rescinded		nesenaca, reservea, ana language removea
34.301	N/A	Mercury (Hg) budget trading program general provisions - rescinded	N/A	Rescinded, reserved, and language removed
34.302	N/A	Hg designated representative for Hg budget	N/A	Rescinded, reserved, and language removed
		sources - rescinded		
34.303	N/A	General Hg budget trading program permit requirements - rescinded	N/A	Rescinded, reserved, and language removed
34.304	N/A	Hg allowance allocations - rescinded	N/A	Rescinded, reserved, and language removed
34.305	N/A	Hg allowance tracking system - rescinded	N/A	Rescinded, reserved, and language removed

#### AQB Rule Tracking Crosswalk

34.306	N/A	Hg allowance transfers - rescinded	N/A	Rescinded, reserved, and language removed
Previous Chapter	Current	Previous Title and	Current Title and	Actions Taken
Number (Prior to 5/15/2024)	Chapter Number	Description (Prior to 5/15/2024)	Description	
34.307	N/A	Monitoring and reporting - rescinded	N/A	Rescinded, reserved, and language removed
34.308	N/A	Performance specifications - rescinded	N/A	Rescinded, reserved, and language removed

35	N/A	Grant Assistance Programs	N/A	Rescinded Ch. 35. (Reserved)
35.1	N/A	Purpose	N/A	Rescinded, reserved, and language removed
35.2	N/A	Definitions	N/A	Rescinded, reserved, and language removed
35.3	N/A	Role of the department of natural resources	N/A	Rescinded, reserved, and language removed
35.4	N/A	Eligible projects	N/A	Rescinded, reserved, and language removed
35.5	N/A	Forms	N/A	Rescinded, reserved, and language removed
35.6	N/A	Project selection	N/A	Rescinded, reserved, and language removed
35.7	N/A	Funding sources	N/A	Rescinded, reserved, and language removed
35.8	N/A	Type of financial assistance	N/A	Rescinded, reserved, and language removed
35.9	N/A	Term of loans	N/A	Rescinded, reserved, and language removed
35.10	N/A	Reduced award	N/A	Rescinded, reserved, and language removed
35.11	N/A	Fund disbursement limitations	N/A	Rescinded, reserved, and language removed
35.12	N/A	Applicant cost share	N/A	Rescinded, reserved, and language removed
35.13	N/A	Eligible costs	N/A	Rescinded, reserved, and language removed
35.14	N/A	Ineligible costs	N/A	Rescinded, reserved, and language removed
35.15	N/A	Written agreement	N/A	Rescinded, reserved, and language removed
35.16	N/A	Financial assistance denial	N/A	Rescinded, reserved, and language removed

JRM 06/19/2024 8