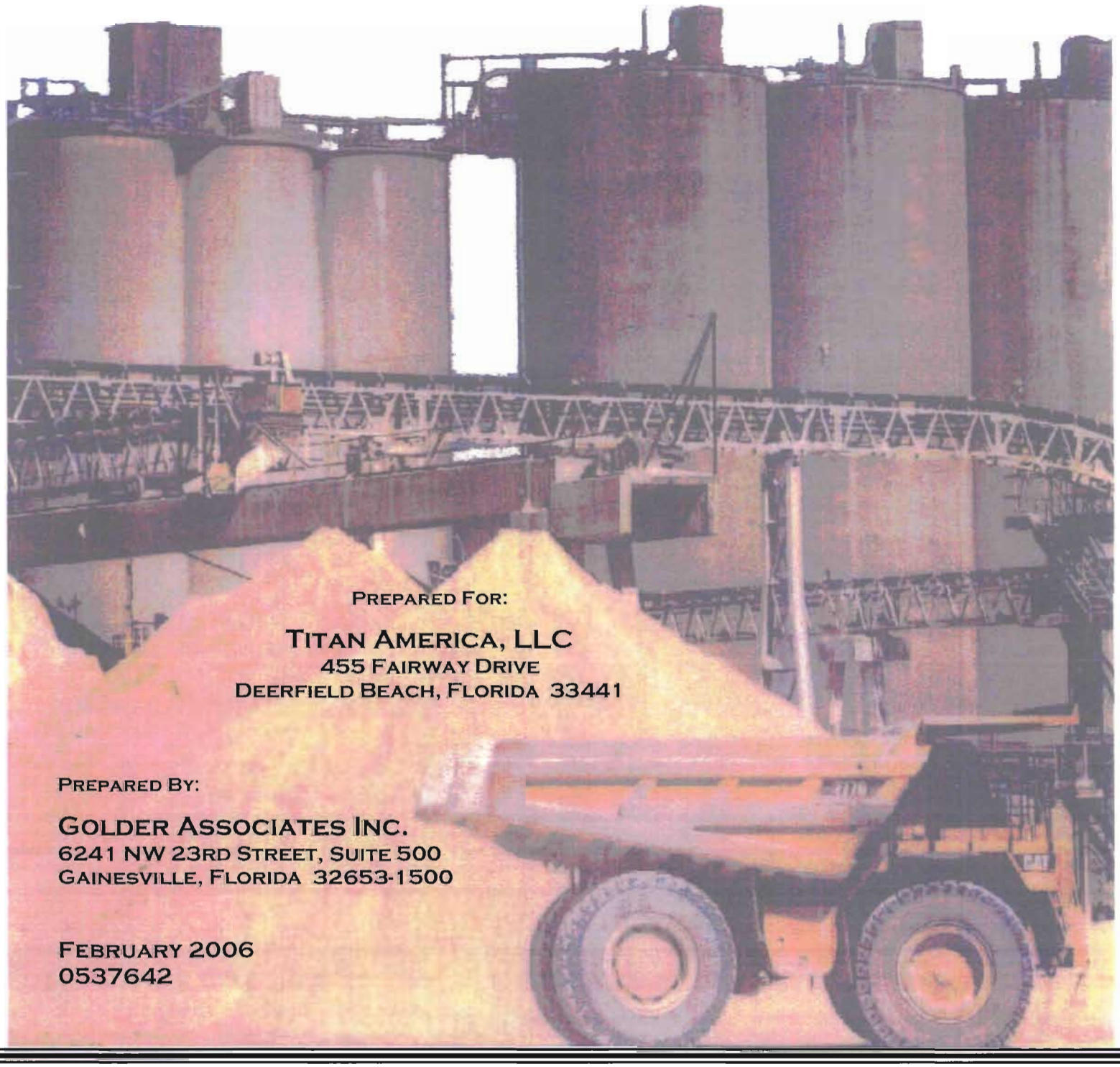
Revised Application For Title V Permit Renewal

Titan America, LLC
Medley, Florida



Prepared For:

Titan America, LLC
455 Fairway Drive
Deerfield Beach, Florida 33441

Prepared By:

Golder Associates Inc.
6241 NW 23rd Street, Suite 500
Gainesville, Florida 32653-1500

February 2006
0537642

REVISED APPLICATION FOR TITLE V PERMIT RENEWAL TITAN AMERICA, LLC *MEDLEY, FLORIDA*

Prepared For:
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455 Fairway Drive
Deerfield Beach, Florida 33441

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0537552

DISTRIBUTION:
4 Copies – FDEP
2 Copies – Titan America, Inc.
1 Copies – Golder Associates Inc.

Department of Environmental Protection

Division of Air Resource Management

APPLICATION FOR AIR PERMIT - LONG FORM

I. APPLICATION INFORMATION

Air Construction Permit – Use this form to apply for an air construction permit for a proposed project:

- subject to prevention of significant deterioration (PSD) review, nonattainment area (NAA) new source review, or maximum achievable control technology (MACT) review; or
- where the applicant proposes to assume a restriction on the potential emissions of one or more pollutants to escape a federal program requirement such as PSD review, NAA new source review, Title V, or MACT; or
- at an existing federally enforceable state air operation permit (FESOP) or Title V permitted facility.

Air Operation Permit – Use this form to apply for:

- an initial federally enforceable state air operation permit (FESOP); or
- an initial/revised/renewal Title V air operation permit.

Air Construction Permit & Revised/Renewal Title V Air Operation Permit (Concurrent Processing Option) – Use this form to apply for both an air construction permit and a revised or renewal Title V air operation permit incorporating the proposed project.

To ensure accuracy, please see form instructions.

Identification of Facility

1. Facility Owner/Company Name: **Titan America, LLC**	
2. Site Name: **Pennsuco**	
3. Facility Identification Number: **0250020**	
4. Facility Location...: Street Address or Other Locator: **11000 N.W. 121 Way** City: **Medley** County: **Dade** Zip Code: **33178**	
5. Relocatable Facility? ☐ Yes ☒ No	6. Existing Title V Permitted Facility? ☒ Yes ☐ No

Application Contact

1. Application Contact Name: **Terry Lancaster, Environmental Manager**
2. Application Contact Mailing Address... Organization/Firm: **Titan America, LLC** Street Address: **455 Fairway Drive** City: **Deerfield Beach** State: **FL** Zip Code: **33441**
3. Application Contact Telephone Numbers... Telephone: **(954) 425-4227** ext. Fax: **(954) 480-9352**
4. Application Contact Email Address: **tlancaster@titanamerica.com**

Application Processing Information (DEP Use)

1. Date of Receipt of Application:	2-24-06
2. Project Number(s):	0250020-014-AV 0250020-019-AC
3. PSD Number (if applicable):	
4. Siting Number (if applicable):	

APPLICATION INFORMATION

Purpose of Application

This application for air permit is submitted to obtain: (Check one)

Air Construction Permit

☐ Air construction permit.

Air Operation Permit

☐ Initial Title V air operation permit.
☐ Title V air operation permit revision.
☐ Title V air operation permit renewal.
☐ Initial federally enforceable state air operation permit (FESOP) where professional engineer (PE) certification is required.
☐ Initial federally enforceable state air operation permit (FESOP) where professional engineer (PE) certification is not required.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit (Concurrent Processing)

☐ Air construction permit and Title V permit revision, incorporating the proposed project.
☒ Air construction permit and Title V permit renewal, incorporating the proposed project.

Note: By checking one of the above two boxes, you, the applicant, are requesting concurrent processing pursuant to Rule 62-213.405, F.A.C. In such case, you must also check the following box:

☒ I hereby request that the department waive the processing time requirements of the air construction permit to accommodate the processing time frames of the Title V air operation permit.

Application Comment

Application to renew Title V Permit No. 0250020-011-AV and to revise the Air Construction Permit No. 0250020-017-AC/PSD-FL-360. See Attachment TM-FI-CC2 for further description of changes.

APPLICATION INFORMATION

Scope of Application

Emissions Unit ID Number	Description of Emissions Unit	Air Permit Type	Air Permit Proc. Fee
026	Coal Handling System		
027	Clinker Handling and Storage		
010, 011, 012, 013, 030	Finish Mill Nos. 1, 2, 3, 4, and 6		
028	Raw Mill and Pyroprocessing Unit		
029	Raw Materials Handling		
014, 015, 016	Cement Storage/Packhouse/Loadout		
024	Concrete Block Plant		
025	Ready Mix Plant		
022, 023	Aggregate Plant		
	Unregulated Units		
031	Fugitive Emissions - Transportation, Misc & Stg.		

Application Processing Fee

Check one: ☐ Attached - Amount: $_____ ☒ Not Applicable

APPLICATION INFORMATION

Owner/Authorized Representative Statement

Complete if applying for an air construction permit or an initial FESOP.

1. Owner/Authorized Representative Name :

2. Owner/Authorized Representative Mailing Address...
   Organization/Firm:
   Street Address:
   City: State: Zip Code:

3. Owner/Authorized Representative Telephone Numbers...
   Telephone: ( ) - ext. Fax: ( ) -

4. Owner/Authorized Representative Email Address:

5. Owner/Authorized Representative Statement:

   I, the undersigned, am the owner or authorized representative of the facility addressed in this air permit application. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made in this application are true, accurate and complete and that, to the best of my knowledge, any estimates of emissions reported in this application are based upon reasonable techniques for calculating emissions. The air pollutant emissions units and air pollution control equipment described in this application will be operated and maintained so as to comply with all applicable standards for control of air pollutant emissions found in the statutes of the State of Florida and rules of the Department of Environmental Protection and revisions thereof and all other requirements identified in this application to which the facility is subject. I understand that a permit, if granted by the department, cannot be transferred without authorization from the department, and I will promptly notify the department upon sale or legal transfer of the facility or any permitted emissions unit.

   _____ _____
   Signature Date

APPLICATION INFORMATION

Application Responsible Official Certification

Complete if applying for an initial/revised/renewal Title V permit or concurrent processing of an air construction permit and a revised/renewal Title V permit. If there are multiple responsible officials, the "application responsible official" need not be the "primary responsible official."

1. Application Responsible Official Name:
   Hardy Johnson, President, Florida Division

2. Application Responsible Official Qualification (Check one or more of the following options, as applicable):
   - ☒ For a corporation, the president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy or decision-making functions for the corporation, or a duly authorized representative of such person if the representative is responsible for the overall operation of one or more manufacturing, production, or operating facilities applying for or subject to a permit under Chapter 62-213, F.A.C.
   - ☐ For a partnership or sole proprietorship, a general partner or the proprietor, respectively.
   - ☐ For a municipality, county, state, federal, or other public agency, either a principal executive officer or ranking elected official.
   - ☐ The designated representative at an Acid Rain source.

3. Application Responsible Official Mailing Address...
   Organization/Firm: **Tarmac America, LLC**
   Street Address: **455 Fairway Drive**
   City: **Deerfield Beach** State: **Florida** Zip Code: **33441**

4. Application Responsible Official Telephone Numbers...
   Telephone: **(954) 481-2808** ext. Fax: **(954) 421-0296**

5. Application Responsible Official Email Address:

6. Application Responsible Official Certification:

   I, the undersigned, am a responsible official of the Title V source addressed in this air permit application. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made in this application are true, accurate and complete and that, to the best of my knowledge, any estimates of emissions reported in this application are based upon reasonable techniques for calculating emissions. The air pollutant emissions units and air pollution control equipment described in this application will be operated and maintained so as to comply with all applicable standards for control of air pollutant emissions found in the statutes of the State of Florida and rules of the Department of Environmental Protection and revisions thereof and all other applicable requirements identified in this application to which the Title V source is subject. I understand that a permit, if granted by the department, cannot be transferred without authorization from the department, and I will promptly notify the department upon sale or legal transfer of the facility or any permitted emissions unit. Finally, I certify that the facility and each emissions unit are in compliance with all applicable requirements to which they are subject, except as identified in compliance plan(s) submitted with this application.

   Signature for Hardy Johnson — 24 Feb 06 Date

APPLICATION INFORMATION

Professional Engineer Certification

1. Professional Engineer Name: **David A. Buff**
   Registration Number: **19011**
2. Professional Engineer Mailing Address...
   Organization/Firm: **Golder Associates Inc.****
   Street Address: **6241 NW 23rd Street, Suite 500**
   City: **Gainesville** State: **FL** Zip Code: **32653**
3. Professional Engineer Telephone Numbers...
   Telephone: **(352) 336-5600** ext. **545** Fax: **(352) 336-6603**
4. Professional Engineer Email Address: **dbuff@golder.com**
5. Professional Engineer Statement:

I, the undersigned, hereby certify, except as particularly noted herein, that:*

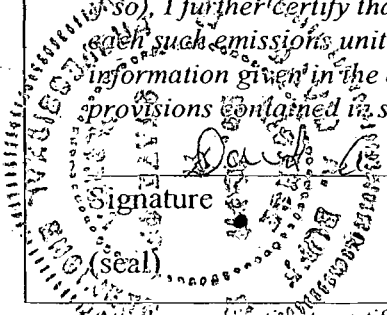
(1) To the best of my knowledge, there is reasonable assurance that the air pollutant emissions unit(s) and the air pollution control equipment described in this application for air permit, when properly operated and maintained, will comply with all applicable standards for control of air pollutant emissions found in the Florida Statutes and rules of the Department of Environmental Protection; and

(2) To the best of my knowledge, any emission estimates reported or relied on in this application are true, accurate, and complete and are either based upon reasonable techniques available for calculating emissions or, for emission estimates of hazardous air pollutants not regulated for an emissions unit addressed in this application, based solely upon the materials, information and calculations submitted with this application.

(3) If the purpose of this application is to obtain a Title V air operation permit (check here ☐, if so), I further certify that each emissions unit described in this application for air permit, when properly operated and maintained, will comply with the applicable requirements identified in this application to which the unit is subject, except those emissions units for which a compliance plan and schedule is submitted with this application.

(4) If the purpose of this application is to obtain an air construction permit (check here ☐, if so) or concurrently process and obtain an air construction permit and a Title V air operation permit revision or renewal for one or more proposed new or modified emissions units (check here ☒, if so), I further certify that the engineering features of each such emissions unit described in this application have been designed or examined by me or individuals under my direct supervision and found to be in conformity with sound engineering principles applicable to the control of emissions of the air pollutants characterized in this application.

(5) If the purpose of this application is to obtain an initial air operation permit or operation permit revision or renewal for one or more newly constructed or modified emissions units (check here ☐, if so), I further certify that, with the exception of any changes detailed as part of this application, each such emissions unit has been constructed or modified in substantial accordance with the information given in the corresponding application for air construction permit and with all provisions contained in such permit.



Signature (seal) Date: 2/24/06

* Attach any exception to certification statement.
** Board of Professional Engineers Certificate of Authorization #00001670

II. FACILITY INFORMATION

A. GENERAL FACILITY INFORMATION

Facility Location and Type

1. Facility UTM Coordinates... Zone **17** East (km) **562.8** North (km) **2861.7**		2. Facility Latitude/Longitude... Latitude (DD/MM/SS) **25/52/30** Longitude (DD/MM/SS) **80/22/30**	
3. Governmental Facility Code: **0**	4. Facility Status Code: **A**	5. Facility Major Group SIC Code: **32**	6. Facility SIC(s): **3241, 3271, 3273**
7. Facility Comment :			

Facility Contact

1. Facility Contact Name: **Terry Lancaster, Environmental Manager**
2. Facility Contact Mailing Address... Organization/Firm: **Titan America, LLC** Street Address: **455 Fairway Drive** City: **Deerfield Beach** State: **FL** Zip Code: **33441**
3. Facility Contact Telephone Numbers: Telephone: **(954) 425-4227** ext. Fax: **(954) 480-9352**
4. Facility Contact Email Address: **tlancaster@titanamerica.com**

Facility Primary Responsible Official

Complete if an "application responsible official" is identified in Section I. that is not the facility "primary responsible official."

1. Facility Primary Responsible Official Name:
2. Facility Primary Responsible Official Mailing Address... Organization/Firm: Street Address: City: State: Zip Code:
3. Facility Primary Responsible Official Telephone Numbers... Telephone: ( ) - ext. Fax: ( ) -
4. Facility Primary Responsible Official Email Address:

FACILITY INFORMATION

Facility Regulatory Classifications

Check all that would apply *following* completion of all projects and implementation of all other changes proposed in this application for air permit. Refer to instructions to distinguish between a "major source" and a "synthetic minor source."

1. ☐ Small Business Stationary Source	☐ Unknown
2. ☐ Synthetic Non-Title V Source	
3. ☒ Title V Source	
4. ☒ Major Source of Air Pollutants, Other than Hazardous Air Pollutants (HAPs)	
5. ☐ Synthetic Minor Source of Air Pollutants, Other than HAPs	
6. ☒ Major Source of Hazardous Air Pollutants (HAPs)	
7. ☐ Synthetic Minor Source of HAPs	
8. ☒ One or More Emissions Units Subject to NSPS (40 CFR Part 60)	
9. ☐ One or More Emissions Units Subject to Emission Guidelines (40 CFR Part 60)	
10. ☒ One or More Emissions Units Subject to NESHAP (40 CFR Part 61 or Part 63)	
11. ☐ Title V Source Solely by EPA Designation (40 CFR 70.3(a)(5))	
12. Facility Regulatory Classifications Comment:	

List of Pollutants Emitted by Facility

1. Pollutant Emitted	2. Pollutant Classification	3. Emissions Cap [Y or N]?
Particulate Matter Total - PM	A	N
Particulate Matter - PM_{10}	A	N
Nitrogen Oxides - NO_x	A	N
Sulfur Dioxide - SO_2	A	N
Carbon Monoxide - CO	A	N
Hydrochloric Acid - H106	A	N
Dioxins/Furans - DIOX	B	N
Volatile Organic Compounds - VOC	B	N
Sulfuric Acid Mist - SAM	B	N
Mercury - Hg	B	N

B. EMISSIONS CAPS

Facility-Wide or Multi-Unit Emissions Caps

1. Pollutant Subject to Emissions Cap	2. Facility Wide Cap [Y or N]? (all units)	3. Emissions Unit ID Nos. Under Cap (if not all units)	4. Hourly Cap (lb/hr)	5. Annual Cap (ton/yr)	6. Basis for Emissions Cap

7. Facility-Wide or Multi-Unit Emissions Cap Comment:

C. FACILITY ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Facility Plot Plan: (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-FI-C1** ☐ Previously Submitted, Date:_____
2. Process Flow Diagram(s): (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-FI-C2** ☐ Previously Submitted, Date:_____
3. Precautions to Prevent Emissions of Unconfined Particulate Matter: (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-FI-C3** ☐ Previously Submitted, Date:_____

Additional Requirements for Air Construction Permit Applications

1. Area Map Showing Facility Location:
   ☐ Attached, Document ID:_____ ☒ Not Applicable (existing permitted facility)
2. Description of Proposed Construction or Modification:
   ☒ Attached, Document ID: **TM-FI-CC2**
3. Rule Applicability Analysis:
   ☒ Attached, Document ID: **See Emission Units Sections.**
4. List of Exempt Emissions Units (Rule 62-210.300(3)(a) or (b)1., F.A.C.):
   ☐ Attached, Document ID: _____ ☒ Not Applicable (no exempt units at facility)
5. Fugitive Emissions Identification (Rule 62-212.400(2), F.A.C.):
   ☐ Attached, Document ID: _____ ☒ Not Applicable
6. Preconstruction Air Quality Monitoring and Analysis (Rule 62-212.400(5)(f), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
7. Ambient Impact Analysis (Rule 62-212.400(5)(d), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
8. Air Quality Impact since 1977 (Rule 62-212.400(5)(h)5., F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
9. Additional Impact Analyses (Rules 62-212.400(5)(e)1. and 62-212.500(4)(e), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
10. Alternative Analysis Requirement (Rule 62-212.500(4)(g), F.A.C.):
    ☐ Attached, Document ID:_____ ☒ Not Applicable

FACILITY INFORMATION

Additional Requirements for FESOP Applications

1. List of Exempt Emissions Units (Rule 62-210.300(3)(a) or (b)1., F.A.C.):
   ☐ Attached, Document ID:_____ ☐ Not Applicable (no exempt units at facility)

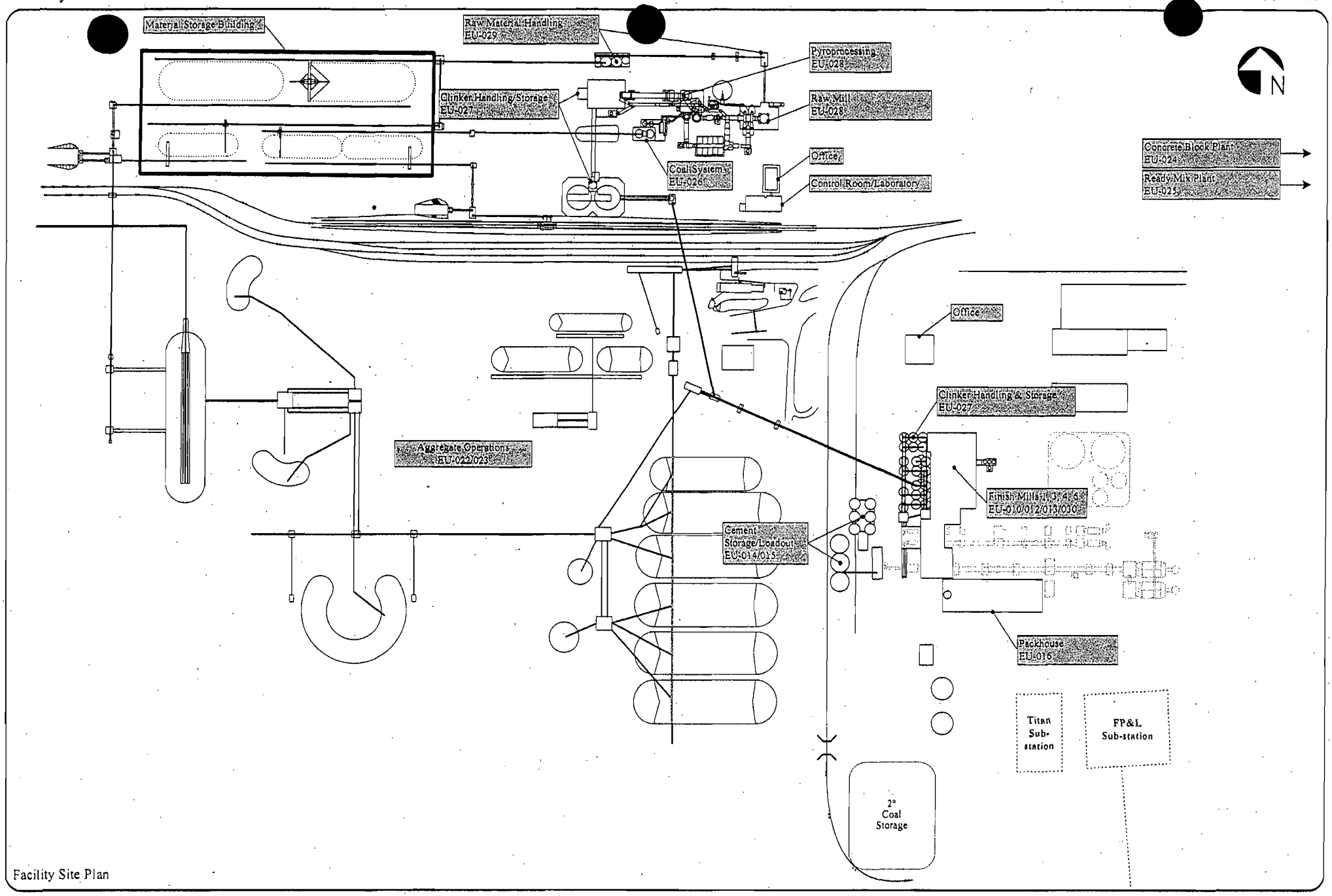
Additional Requirements for Title V Air Operation Permit Applications

1. List of Insignificant Activities (Required for initial/renewal applications only):
   ☒ Attached, Document ID:**TM-FI-CV1** ☐ Not Applicable (revision application)
2. Identification of Applicable Requirements (Required for initial/renewal applications, and for revision applications if this information would be changed as a result of the revision being sought):
   ☒ Attached, Document ID:**TM-FI-CV2**
   ☐ Not Applicable (revision application with no change in applicable requirements)
3. Compliance Report and Plan (Required for all initial/revision/renewal applications):
   ☒ Attached, Document ID:**TM-FI-CV3**
   Note: A compliance plan must be submitted for each emissions unit that is not in compliance with all applicable requirements at the time of application and/or at any time during application processing. The department must be notified of any changes in compliance status during application processing.
4. List of Equipment/Activities Regulated under Title VI (If applicable, required for initial/renewal applications only):
   ☐ Attached, Document ID:_____
   ☐ Equipment/Activities On site but Not Required to be Individually Listed
   ☒ Not Applicable
5. Verification of Risk Management Plan Submission to EPA (If applicable, required for initial/renewal applications only) :
   ☐ Attached, Document ID:_____ ☒ Not Applicable
6. Requested Changes to Current Title V Air Operation Permit:
   ☒ Attached, Document ID:**TM-FI-CC2** ☐ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-FI-C1

PLOT PLANS



Facility Site Plan

DESCRIPTION

Attachment TM-FI-C1a
FACILITY PLOT PLAN

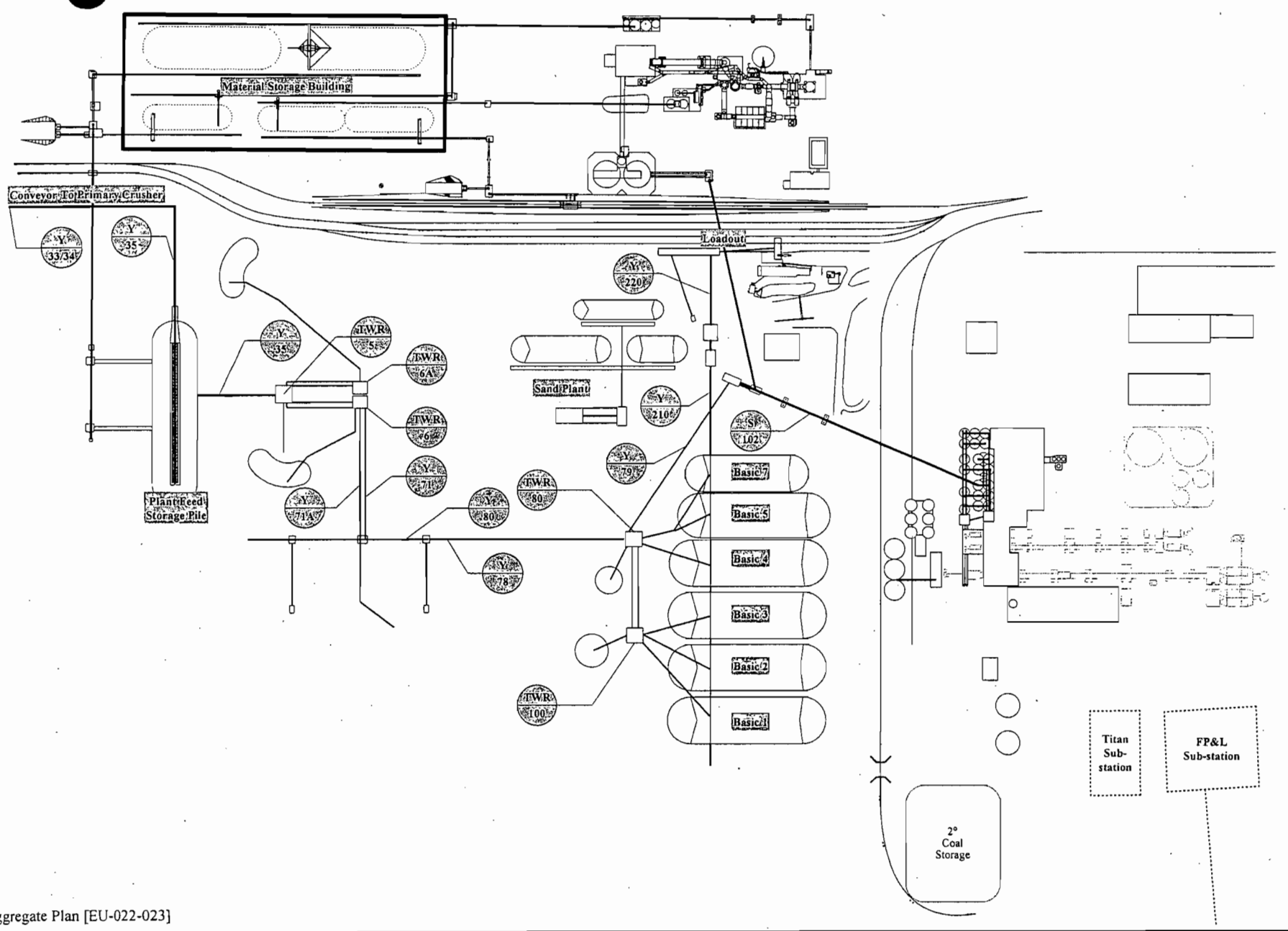
TITLE: PENNSUCO CEMENT

FILENAME: 0537642/4.4/PlotPlans.vsd

LAST REVISION DATE: 1/26/2006

LEGEND
Air Flow
Solid Matter

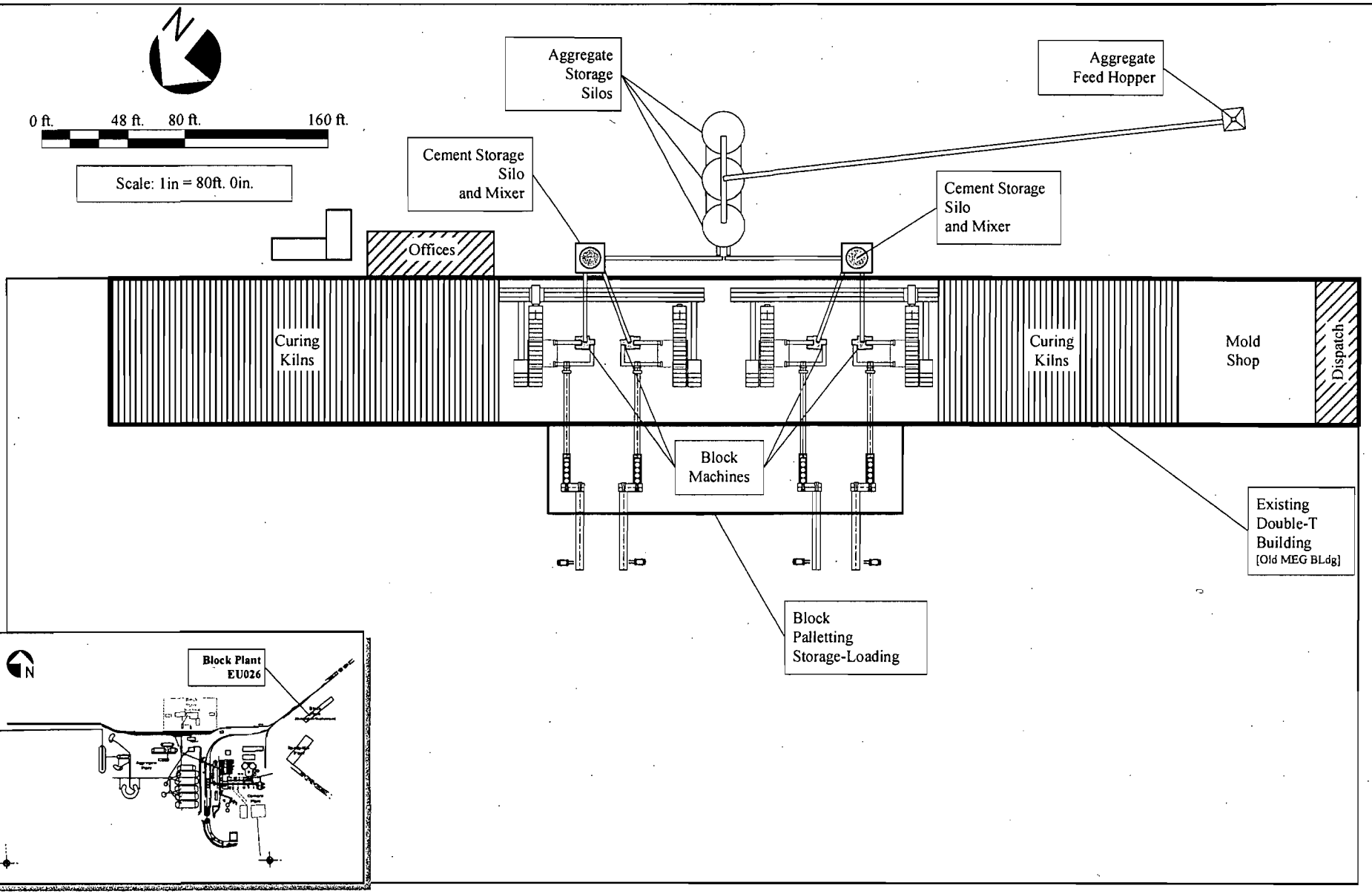
TITAN AMERICA



Aggregate Plan [EU-022-023]

DESCRIPTION Attachment TM-FI-C1b PLOT PLAN - AGGREGATE PLANT	TITLE: **PENNSUCO CEMENT** FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	LEGEND Air Flow Solid Matter

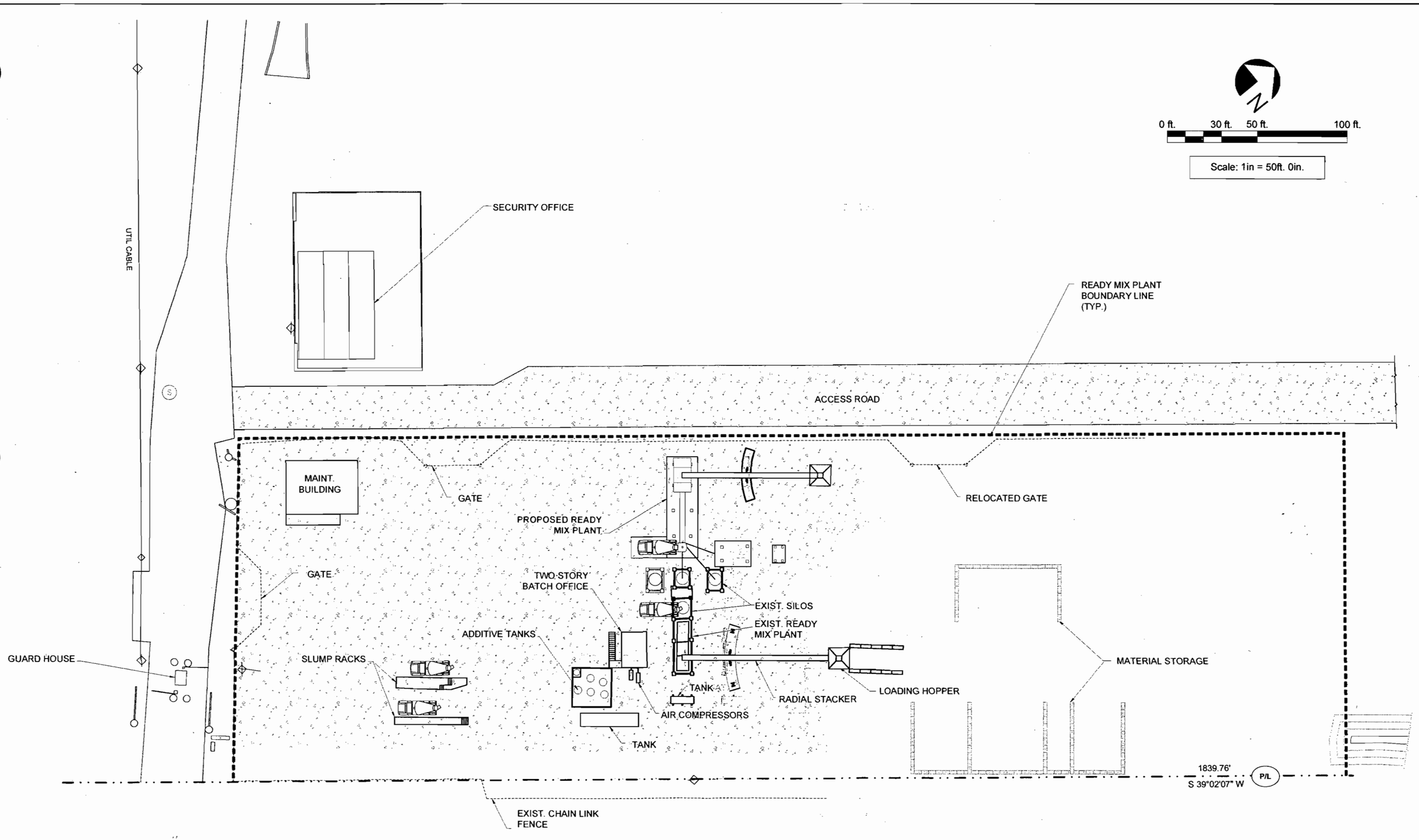
TITAN AMERICA



Facility Plot Plan [NTS]

Pennsuco Block Plant [EU-026]

DESCRIPTION **Attachment TM-FI-C1c** **CONCRETE BLOCK PLANT** **SITE PLAN**	TITLE: **PENNSUCO BLK - RELOCATION/REPLACEMENT** FILENAME: 0537648/4.4/TM-FI-C1c.vsd LAST REVISION DATE: 2/23/06	TITAN AMERICA



DESCRIPTION

Attachment TM-FI-C1d
Ready Mix Plant
11955 NW 102 ROAD
MEDLEY, FLORIDA

TITLE:	**PENNSUCO RMC**
FILENAME:	RMC-PENNSUCO.VSD
LAST REVISION DATE:	2/24/2006

Tarmac
A Titan America Business

ATTACHMENT TM-FI-C2

PROCESS FLOW DIAGRAM

MAIN STACK

331.BF200
515,000 ACFM
[Mill On]
605,000 ACFM
[Mill Off]

331.BF740
4,250 ACFM

341.BF350
3,760 ACFM

351.BF470
4,100 ACFM

BF-400
15,000 ACFM

B382
5,100 ACFM

B210
2,500 ACFM

B110
2,500 ACFM

331.AS510

341.AS160

351.AS310

KILN DUST

331.BF645
3,500
ACFM

331.BE400

331.CV340/360/380/385

RETURN TO SYSTEM

TRUCK LOADOUT

341.BE100

CF SILO

351.BE200

PREHEATER TOWER

IN-LINE CALCINER

BF-200
6,200 ACFM

PACKHOUSE

LOADOUT 3

LOADOUT 2

LOADOUT 1

BF-120
4,000 ACFM

B372
2,000 ACFM

B374
2,000 ACFM

311.BF950
11,700 ACFM

321.CN710

321.CN720

321.CN730

321.CN740

321.AS820

321.AS830

311.BC900

321.BF470
10,800 ACFM

311.BC800

RAW MILL

351.BF410
4,000
ACFM

Raw Meal

321.AS840

311.BF750
7,750 ACFM

311.BC700

311.BF650
8,500 ACFM

Mill On

Mill Off

351.BF440
4,760
ACFM

351.AS160

F515
5,000 ACFM

F514
5,000 ACFM

F513
5,000 ACFM

F512
10,000 ACFM

F511
18,000 ACFM

CEMENT DISTRIBUTION

RAW MATERIAL FEED BINS

RAW MATERIAL

HANDLING STORAGE

FUEL

461.BF130
1,400 ACFM

461.BF230
1,400 ACFM

COAL/PETCOKE FEED BINS

461.BC300

461.BF350
5,550 ACFM

461.BF500
54,500 ACFM

NSPS Subpart Y Facilities

COAL MILL

461/SC525/535/540

461.BF750
294 ACFM

PETCOKE BIN

COAL BIN

461.BF650
294 ACFM

KILN

481.BF140
12,000 ACFM

441.BF540
4,600 ACFM

CLINKER COOLER

471.DB100

471.DB200

481.BF730
18,700 ACFM

F633
6,000 ACFM

K447
5,000 ACFM

481.BF930
15,000 ACFM

F432
15,000 ACFM

F430
32,000 ACFM

FM #4

O'Sepa Cement Separator

F730
117,000 ACFM

516.BF510
1,950 ACFM

536BF.500
25,900 ACFM

FM #6

O'Sepa Cement Separator

536.BF340
97,300 ACFM

F313
8,000 ACFM

F332
25,000 ACFM

FM #3

O'Sepa Cement Separator

533.BF340
77,800 ACFM

F130
16,480 ACFM

F113
11,800 ACFM

FM #1

FM #1

Cement Separator

F213
11,800 ACFM

F230
16,480 ACFM

FM #2

Cement Separator

CLINKER SILO

481.BF330
6,100 ACFM

OFF-SPEC CLINKER

CLINKER SILO

481.BF640
4,700 ACFM

481.BF540
4,700 ACFM

481.BC500
[S102]

CLINKER STORAGE SILOS

481.DB400

ATTACHMENT TM-FI-C2. PROCESS FLOW DIAGRAM

TITLE:	PENNSUCO CEMENT
FILENAME:	0537642/4.4/TM-F1-C2.vsd
LAST REVISION DATE:	February 22, 2006

LEGEND

Gas

Solids

TITAN AMERICA

ATTACHMENT TM-FI-C3

PRECAUTIONS TO PREVENT EMISSIONS OF UNCONFINED PARTICULATE MATTER

ATTACHMENT TM-FI-C3

PRECAUTIONS TO PREVENT EMISSIONS

OF UNCONFINED PARTICULATE MATTER

Titan will employ reasonable precautions to control emissions of unconfined PM. These reasonable precautions include the following:

COAL HANDLING SYSTEM (EU 026)

Particulate and fugitive emissions from coal handling facilities shall be minimized by following the procedures listed below:

1. All conveyors and transfer points shall be enclosed or covered to preclude particulate emissions (except those directly associated with coal stacking/reclaiming).
2. Coal storage piles shall be shaped, compacted, and oriented to minimize wind erosions.
3. Water sprays or chemical wetting agents and stabilizers shall be applied to outside storage piles, handling equipment, etc., during dry periods as necessary to all facilities to maintain an opacity of less than 20 percent at the property line for fugitive emission sources.

PERSONNEL

1. Train all aggregate and material handling personnel on visible emissions and standard operating procedures for controlling fugitive emissions.
2. Personnel shall be trained on proper operation of wet-dry sweeper and water truck operation. Training shall include, but not be limited to, speed nozzle operation and cleaning operation patterns around the facility.
3. Maintain current speed limit of 19.5 mph and communicate to all outside hauling companies the importance of controlling visible emissions within the facility property boundary.
4. Maintain all paved road surfaces in a manner consistent with the visible emission standard of 5 percent. This includes, but is not limited to, daily sweeping, daily operation of water truck, and maintaining records in accordance with PCMACT documentation.
5. Maintain dedicated bermed areas that have been established throughout the facility to further reduce wind erosion from ground areas.
6. Install a sprinkler system to reduce dust along the aggregate road between the pits and the storage building.

7. Improve the main entrance by establishing green areas between the security gate and the main facilities.

MATERIALS

1. As much as feasible, raw materials and fuels for the cement facility will be storage inside the raw material building. All material within the raw material building will be moved by stacker/reclaimer and covered conveyor belts.
2. All conveyors are to be enclosed on at least three sides.
3. The facility must continue to maintain the clinker production area and continue to implement a cleaning process inside buildings to minimize dust.
4. Unloading and reclaiming of materials will be curtailed during windy or dry conditions.
5. Raw materials will be managed to minimize the time in storage.

TRUCKS

1. All trucks leaving the aggregate facility will be required to dewater and drive through the tire wash system.
2. Titan America/Tarmac will work with all transport companies to further educate drivers of the Florida Department of Transportation requirements that all loads be tarped prior to leaving the facility.
3. All trucks traveling within the cement facility should stay on asphalt or concrete surfaces. All road surfaces outside of the aggregate facility shall be constructed of concrete and/or asphalt.

Titan will also follow the fugitive dust improvement plan contained in Appendix D of Permit No. 0250020-017-AC (see attached).

APPENDIX D
Facility Fugitive Emissions Control
Fugitive Dust Improvement Plan
(Status Report – February 2006)

Pursuant to Rule 62-296.320(4)(c)2., F.A.C., Reasonable Precautions for Emissions of Unconfined Particulate Matter, the permittee shall take the following additional specific reasonable precautions within the timeframes specified to control facility-wide emissions of unconfined particulate matter (PM) {see the scheduled timeframes immediately following each action}:

a. The applicant completed a preliminary evaluation of changes and improvements to the traffic patterns at the facility, as well as the need for additional paving, in order to further reduce fugitive dust emissions. The specific actions below are required to be completed in order to improve traffic patterns.

i. The permittee shall reroute truck traffic associated with the Pack house. A new entrance road shall be constructed by extending 106th Avenue north along the east side of the property, just east of the old ESPs. This road improvement will be implemented in cooperation with the City of Medley. Once the entrance road is completed, the lime rock road from the Pack house to 106th Avenue shall be paved. This will reduce truck traffic on the Main plant entrance road (off U.S. 27), and will reduce fugitive emissions from unpaved roads.

Anticipated Schedule: Dependent upon the City of Medley to improve 106th Avenue.

The old wet kilns have been demolish the last step is to remove the old stacks because it was found that the new road would not be wide enough to accommodate the new traffic patterns. The surveying is complete and the physical lay-out completed. Titan America has obtained one of several construction permits. Contingent upon the remainder of the permits the project is scheduled for a fall 2006 completion.

ii. The permittee shall work with the City of Medley to upgrade 102nd road. This will reduce carry-in of road dust on trucks entering the Titan property from 102nd road, and also improve the drainage of accumulation of silt within the roadway.

Schedule: The permittee is currently working with City of Medley. Schedule will be dependent on the City of Medley.

The city is in the process of installing new drainage system along the road. Additional, Titan has constructed a new entrance on the Southside of the block facility to be utilized by block, ready-mix, and employees.

iii. After these preliminary actions have been completed, the permittee shall submit a final evaluation of any further changes and improvements to the traffic patterns at the facility, as well as the need for additional paving, in order to reduce fugitive dust emissions.

Pending completion on item i and ii.

b. The permittee shall berm exposed areas of the plant to prevent truck traffic from traveling over such areas.

Schedule: Already implemented and ongoing.

The cement side of the facility has begun implementation of the berming along the north and east side of the Penk5.

c. The permittee shall install a wheel wash system in an area directly leading out of the Aggregate Plant. This area will also include a dewatering area for trucks which will assist in cutting down on the amount of drag-out from the facility.
Schedule: Operational by April 30, 2006.

The CER has been completed and a final design has been submitted (See Attached). The engineering department is obtaining construction permits final construction should be completed by April 30, 2006.

d. The permittee shall take measures to minimize silt buildup on the paved road leading out of the Aggregate Plant. This will reduce silt re-entrainment and carryout by trucks.
Schedule: Measures implemented beginning in October 2005 and finalized with the addition of the new water truck in December 2005.

During December 2005 the facility installed new railroad tracks directly east of the aggregate scales this will enable the facility to re-surface this entire area to maintain correct flow pattern for run-off material. The anticipated completion date: June, 2006.

e. The permittee currently employs one (1) watering truck with a dedicated driver to provide water suppression on the paved roads in the plant. The permittee issued a purchase order for a second watering truck with pressure spray. This second truck will provide a more effective watering program to reduce fugitive PM emission throughout the facility.
Schedule: Exact delivery date is unknown; expected by December 2005.

The facility acquired a used water truck in December, 2005 and employee's two full-time drivers to operate both water trucks during regular business hours.

f. The permittee shall operate road sweepers 5 days a week at the facility. Road sweepers shall be used on high traffic roads.
Schedule: This sweeping program has already been implemented and is proving to be effective in reducing fugitive PM emissions.

The facility now operates two sweepers one dedicated to the paved roads and parking lots. The other unit operates on the kiln side of the facility and under equipment.

g. A sprinkler system shall be installed along the main haul road from the quarry to the Aggregate Plant. This will reduce fugitive PM emissions from this unpaved road.
Schedule: Complete by December 20, 2005.

The wells have been installed; piping is in place the final connections will be completed by March, 2005. Additional, sprinklers have been installed on the north side of the raw material building and now operate on a timer.

h. The permittee shall take measures to reduce fugitive PM emissions from Bulk Cement Load out area. This area has been observed to experience visible dust emissions.

Schedule: Evaluation of options no later than November 2005. The equipment associated with these improvements will be included in the 2006 Capital Improvement Plan to be implemented no later than the first half 2006.

Titan America completed the evaluation of the entire cement load-out system determining which load-outs would receive maximum benefit from updating the dust collector system. It was determined to install two new dust collectors at 2,000 cfm each on load-out spouts #1 and #3. Titan is reviewing the proposed bids to award the final contract for installation. Once the final contract is signed Titan America will submit a Title V Construction permit to Florida Department of Environmental Protection.

i. The permittee shall make landscape upgrades to further enhance not only the aesthetics of the facility, but also to further decrease the wind erosion of unpaved areas.
Schedule: To be developed.

The area directly to the south of the maintenance building is in the process of complete redevelopment. This redevelopment will include the contouring to address drainage from the new road leading out of the facility and a large amount of green space. Additional, other areas around the facility are being discussed.

j. Best Management Practices (BMP's) shall be implemented to minimize fugitive PM emissions from outside raw material storage piles (i.e., bauxite, fly ash, iron ore, etc.). The BMP's to be implemented are below:

i. Raw material inventory shall be managed to minimize the time in storage;
ii. Unloading and reclaiming of materials shall be curtailed during windy or dry conditions;
iii. Drop heights of material shall be minimized;
iv. Posting and enforcing speed limits along haul roads leading to the storage areas; and,
v. Raw materials are normally high moisture content when received. Application of water or other dust suppressants shall be used as necessary to minimize visible emissions.

Schedule: Implement in October 2005.

k. The dust collector preventative maintenance crew developed an Operation and Maintenance (O&M) Program for all dust collectors at the facility. This will reduce the potential for dust collector malfunction and excess PM emissions.
Schedule: The O&M Plan shall be implemented in August 2005.

In the Title V Renewal and Construction application Titan America included the Operation & Maintenance Program as required by PC MACT regulation.

l. Upgrades to the air slides on the package cement load-out and the new Pack house shall be completed October 2005. This new system will eliminate a package load-out system designed and built in the early 1950's. Adjacent to this area a new clinker silo dust collecting system is being designed to improve dust collection for clinker handling. This will result in reducing fugitive dust emissions from these areas.
Schedule: The equipment associated with these improvements will be included in the 2006 Capital Improvement Plan to be implemented no later than the second quarter 2006.

The construction of the new Packhouse and updating of the air slides was completed in September, 2005. The required Method 9 visible emission testing was completed on November, 2005 and submitted to DERM.

m. The permittee shall upgrade the finish mill systems. This will include installing a new finish mill (No. 6) and a dust suppression system. Once this system is in operation, one of the old finish mill systems will be permanently shut down.
Schedule: Implement by October 2005 with completion by December of 2005.

The construction of new finish mill #6 was completed in October 2005. The required Method 9 visible emission testing was completed in December 2005 and submitted to DERM.

The permittee shall submit quarterly progress reports to include a status report on each specific action implemented under this Appendix, Conditions a through m. The first quarterly report shall be submitted in January 2006, with updates every 3 months thereafter for a two-year period.
The progress reports shall be submitted to the compliance authority (Miami-Dade County DERM) with copies to the SED Air Program and the Bureau of Air Regulation.

Titan America will be submitting the first this Fugitive Dusts Control Plan to DERM, SED Air Program and the Bureau of Air Regulations on March 1, 2006.
[Rule 62-296.320(4)(c)2., F.A.C., Rule 62-4.070(3), F.A.C.; Application received April 18, 2005; and, Fugitive Dust Improvement Plan dated August 19, 2005.]

ATTACHMENT TM-FI-CC2

DESCRIPTION OF PROPOSED CONSTRUCTION OR MODIFICATION

ATTACHMENT TM-FI-CC2

DESCRIPTION OF PROPOSED CONSTRUCTION OR MODIFICATION

On October 26, 2000 the Florida Department of Environmental Protection (FDEP) issued the initial Title V air operation permit (Permit No. 0250020-002-AV) to Titan America, LLC for the operation of the Titan America Pennsuco Portland cement manufacturing facility in Medley, FL. The permit was revised in 2004, and issued as permit No. 0250020-013-AV. This permit expired on October 25, 2005, and the renewal application was submitted to the FDEP in April 2005. A revision to the renewal application is submitted with this document.

On April 5, 2005, a construction permit was issued for the new dry process cement plant (including Kiln #5) (Permit No. 0250020-016-AC), which provided the final configuration and operating parameters of baghouses for the cement plant modernization. On December 7, 2005, Permit No. 0250020-017-AC/PSD-FL-360 was issued to increase clinker production from 1,642,500 tons per year (TPY) to 2,190,000 TPY for the new dry process cement plant. Permit No. 0250020-017-AC/PSD-FL-360 incorporates Titan's recent comments and proposed modifications. The same changes are reflected in this revised renewal application.

In support of the revision to the Title V renewal application, Titan conducted a thorough review of all baghouse information previously contained in the permit applications. The purpose of this review was to verify and document baghouse design parameters. From this review, Titan has revised the flow rate information for specific baghouses within the coal handling system, and the cement storage, distribution, and packhouse emissions units at the Pennsuco Cement plant.

Based on the revised information, the PM/PM_{10} emission rates from the baghouses have also been revised, which are reflected in this revised renewal application. A revised Table 3-2 (application to increase production dated April, 2005) summarizing the revised PM/PM_{10} emission rates from the cement plant emissions units is attached.

The following changes are reflected in this Title V renewal application:

FACILITY SECTION

A new emissions unit – "Fugitive Emissions – Transportation, Miscellaneous Transfers, and Storage" with emission unit ID No. 031 has been added. This is an emission unit which emits no "emission-

limited pollutant" and which is subject to no unit-specific work practice standard. The emissions unit includes fugitive PM emissions generated from vehicular traffic, handling, transfer, and storage of coal, petcoke, and raw materials. These fugitive emissions were originally part of the Coal and Petroleum Coke Handling System (EU 026) and Raw Material Handling Operations (EU 029).

COAL HANDLING SYSTEM (EU 026)

- Coal Mill baghouse ID 461.BF300 renamed to 461.BF500
- Baghouse air flows changed from August 30, 2005 revision as follows –

461.BF350	5,500 acfm	5,550 acfm

- Change point source emissions from coal handling baghouses from 3.10 TPY to 3.21 TPY.
- Fugitive PM/PM_{10} emissions from coal and petcoke handling transfer points and vehicular traffic in the coal handling area are removed from the emissions unit and made part of the new Fugitive Emissions emission unit (EU 031).

CLINKER HANDLING AND STORAGE SYSTEM (EU 027)

- Existing baghouse K-447 controlling PM/PM_{10} emissions from silo #17 has been added, bringing the total number of emissions points at the Clinker Handling and Storage System to 9 baghouses.
- Attachment TM-EU2-F1.8 has been revised to show total PM/PM_{10} emissions changed from 19.7 TPY to 22.7 TPY from the Raw Material Handling System.
- Revised process flow diagram in Attachment TM-EU2-I1b to show baghouse K447 and correct air flow routes.

FINISH MILL NOS. 1, 2, 3, 4, and 6 (EU 010, 011, 012, 013, 030)

- Existing Finish Mill No. 2 has been added as a back-up finish mill, which will operate only when another mill is shut down. PM/PM_{10} emissions from Finish Mill No. 2 are controlled by baghouses F-213 and F-230.
- The list of emission points has been revised to include existing baghouses F-213, F-230, and 516.BF510 (Finish Mill No. 6) bringing the total number of emission points at the Finish Mill Nos. 1, 2, 3, 4, and 6 to 13 baghouses.
- Baghouse ID No. F-728 renamed to F-730, and F-330 has been renumbered as F-332.

- Baghouse air flows changed from August 30, 2005 revision as follows –

Baghouse	From	To
F-130	12,000 acfm	16,480 acfm
F-213	--	11,800 acfm
F-230	--	16,480 acfm
F-332	20,000 acfm	25,000 acfm
516.BF510	--	1,950 acfm

- Total point source emissions from Finish Mill Nos. 1, 2, 3, 4, and 6 changed from 133.83 TPY to 136.2 TPY.

RAW MILL AND PYROPROCESSING SYSTEM (EU 028)

- Stack height for the main stack revised to 410 feet (ft).
- Exhaust temperature for the main stack revised to 200 degrees Fahrenheit (°F).
- Particulate matter emissions from the preheater/raw mill/calciner main stack have been reduced slightly to 0.063 lb/ton dry kiln feed (DKF) for PM and 0.053 lb/ton DKF for PM_{10}.
- Mercury has been added to the list of pollutants from the emission unit as an emission-limited pollutant.

RAW MATERIALS HANDLING (EU 029)

Fugitive PM/PM_{10} emissions from raw material handling transfer points and vehicular traffic in the raw material handling area are removed from the emissions unit and made part of the new Fugitive Emissions emission unit (EU 031).

CEMENT STORAGE, LOADOUT, AND PACKHOUSE (EUs 014, 015, 016)

- Baghouse ID No. B-205 in the packhouse renamed to B-200.
- Baghouse air flows changed from August 30, 2005 revision as follows –

Baghouse	From	To
B-110	3,000 acfm	2,500 acfm
B-210	3,000 acfm	2,500 acfm
B-382	5,000 acfm	5,100 acfm

- Total point source emissions from the baghouses changed from 31.2 TPY to 30.9 TPY.

CONCRETE BLOCK PLANT (EUs 024)

Emissions calculation for PM_{10} from the baghouses revised using emissions factor from AP-42 Table 11.12-2, Concrete Batching, Fifth Edition, October 2001.

READY-MIX PLANT (EU 025)

- Emissions calculation for PM/PM_{10} from the baghouses revised using emissions factors from AP-42 Table 11.12-2, Concrete Batching, Fifth Edition, October 2001.
- List of baghouses controlling PM/PM_{10} emissions from the Ready-Mix plant revised as follows as follows –

Baghouse	Source	Airflow
CP-310	Cement/Flyash Silo No. 1	1,600 acfm
CP-310	Cement/Flyash Silo No. 2	1,600 acfm
CP-310 (2 units)	Cement/Flyash Silo No. 3	1,600 acfm
CP-340	Cement/Flyash Silo No. 4	1,800 acfm
KR-1100	Weigh/Loadout No. 1	6,500 acfm
VH-1083-JP	Weigh/Loadout No. 2	6,500 acfm

PSD APPLICABILITY

The PSD applicability analysis forming the basis of permit no. 0250020-017-AC/PSD-FL-360 has been revised due to the above changes in PM/PM_{10} emissions. The baseline emissions are the same presented in the Technical Evaluation and Preliminary Determination for this permit. A revised net emissions increase table (Table 3-4 of application to increase production) is attached.

As shown in revised Table 3-4, and reflected in Permit No. 0250020-017-AC, carbon monoxide (CO) remains the only pollutant triggering prevention of significant deterioration (PSD) review. Since the CO emissions increase remains unchanged, the modeling analysis performed for CO in September 2005 also remains valid; this demonstrated that CO impacts were significantly lower than the significant impact thresholds for CO.

REVISION TO PERMIT NO. 0250020-017-AC/PSD-FL-360

Titan will be submitting revised permit wording (electronic markup) of the Title V permit application in the near future.

TABLE 3-2
MAXIMUM ANNUAL EMISSIONS FROM MATERIAL HANDLING POINT SOURCES, TITAN PENNSUCO CEMENT PLANT
(REVISION 2-23-06)

Emission Unit ID	Emission Source	Baghouse ID	Emission Basis	Potential Annual PM Emission Rate (TPY)	Potential Annual PM_{10} Emission Rate (TPY)
026	Coal Handling/Coal Mill System	6 baghouses	See TM-EU1-F1.8	3.21	3.21
027	Clinker Handling and Storage	9 Baghouses	See TM-EU2-F1.8	22.74	22.74
010, 011, 012, 013, 030	Finish Mill Nos. 1, 2, 3, 4, and 6	13 baghouses	See TM-EU3-F1.8	136.15	136.15
014, 015, 016	Cement Storage, Packhouse, & Loadout	13 Baghouses	See TM-EU6-F1.8	30.90	30.90
028	Raw Mill and Pyroprocessing without Kiln/Cooler/Raw Mill	7 Baghouses	See TM-EU4-F1.8a	7.00	7.00
029	Raw Material Handling and Storage	4 Baghouses	See TM-EU5-F1.8	13.00	13.00
			Total	213.00	213.00

TABLE 3-4
NET CHANGE IN EMISSIONS AND PSD SIGNIFICANT EMISSION RATES, TITAN PENNSUCO CEMENT PLANT (REVISION 02/23/06)

	PSD Baseline Emissions (TPY)[a]						Future Potential Emissions (TPY)						
Pollutant	Kiln No. 2	Kiln No. 3	Material Handling Point Sources	Slag Dryer	Material Handling Fugitive Sources[e]	Total	New Raw Mill Preheater/ Calciner/Kiln/ Cooler	Material Handling Point Sources	Material Handling Fugitive Sources	Total	Net Increase in Emissions (TPY)	PSD Significant Emission Rate (TPY)	PSD Review Applies?
Particulate Matter [PM(TSP)]	41.13	99.16 [b]	199.50	1.35	43.96	385.1	117.3	213.0	22.7	353.0	-32.1	25	No
Particulate Matter (PM_{10})	34.97	84.29 [b]	171.20	1.15	15.39	307.0	98.7	213.0	8.0	319.7	12.7	15	No
Sulfur Dioxide	42.74	471.60	--	NR	--	514.3	548	--	--	548	33.7	40	No
Nitrogen Dioxide	516.70	1,827.28	--	NR	--	2,344.0	2,376	--	--	2,376	32.0	40	No
Carbon Monoxide	71.94	1,251.24	--	NR	--	1,323.2	2,190	--	--	2,190	866.8	100	Yes
Votatile Organic Compounds	27.78	117.39 [c]	--	NR	--	145.2	175	--	--	175	29.8	40	No
Sulfuric Acid Mist	0.30	18.86 [d]	--	NR	--	19.16	11.8	--	--	11.8	-7.3	7	No
Lead	--	--	--	--	--	0.0470 [f]	0.6465	--	--	0.6465	0.5995	0.6	No
Mercury	--	--	--	--	--	0.0150 [f]	0.1145	--	--	0.1145	0.0995	0.1	No

NR = not reported
NEG = Negligible.

[a] Based on average of 2002-2003 AOR data,

[b] For PM/PM10, only 2003 data used since 2002 was not representative.

[c] Based on historic test data using 2002-2003 production data.

[d] Not reported on AOR. Based on 4% of SO_2 emissions.

[e] Not quantified in AOR. Used 1996-1997 baseline emissions based on 2002-2003 emissions being at least as high.

[f] Back calculated to avoid PSD.

ATTACHMENT TM-FI-CV1

LIST OF INSIGNIFICANT ACTIVITIES

ATTACHMENT TM-FI-CV1

LIST OF INSIGNIFICANT EMISSION UNITS AND/OR ACTIVITIES

There are no emission units and/or activities at the Titan Pennsuco Portland cement manufacturing facility that are considered insignificant pursuant to Rule 62-213.430(6), F.A.C.

ATTACHMENT TM-FI-CV2

TITLE V CORE LIST

ATTACHMENT TM-FI-CV2

TITLE V CORE LIST
(Effective 03/01/02)

[Note: The Title V Core List is meant to simplify the completion of the "List of Applicable Regulations" for DEP Form No. 62-210.900(1), Application for Air Permit – Long Form. The Title V Core List is a list of rules to which all Title V Sources are presumptively subject. The Title V Core List may be referenced in its entirety, or with specific exceptions. The Department may periodically update the Title V Core List.]

Federal:	***(description)***
40 CFR 61, Subpart M	NESHAP for Asbestos
40 CFR 82	Protection of Stratospheric Ozone
40 CFR 82, Subpart B	Servicing of Motor Vehicle Air Conditioners (MVAC)
40 CFR 82, Subpart F	Recycling and Emissions Reduction

State:	***(description)***
CHAPTER 62-4, F.A.C.: PERMITS, effective 06-01-01	
62-4.030, F.A.C.	General Prohibition
62-4.040, F.A.C.	Exemptions
62-4.050, F.A.C.	Procedure to Obtain Permits; Application
62-4.060, F.A.C.	Consultation
62-4.070, F.A.C.	Standards for Issuing or Denying Permits; Issuance; Denial
62-4.080, F.A.C.	Modifications of Permit Conditions
62-4.090, F.A.C.	Renewals
62-4.100, F.A.C.	Suspension and Revocation
62-4.110, F.A.C.	Financial Responsibility
62-4.120, F.A.C.	Transfer of Permits
62-4.130, F.A.C.	Plant Operation – Problems
62-4.150, F.A.C.	Review
62-4.160, F.A.C.	Permit Conditions

State:	*(description)*
62-4.210, F.A.C.	Construction Permits
62-4.220, F.A.C.	Operation Permit for New Sources

CHAPTER 62-210, F.A.C.: STATIONARY SOURCES – GENERAL REQUIREMENTS, effective 06-21-01

62-210.300, F.A.C.	Permits Required
62-210.300(1), F.A.C.	Air Construction Permits
62-210.300(2), F.A.C.	Air Operation Permits
62-210.300(3), F.A.C.	Exemptions
62-210.300(5), F.A.C.	Notification of Startup
62-210.300(6), F.A.C.	Emissions Unit Reclassification
62-210.300(7), F.A.C.	Transfer of Air Permits
62-210.350, F.A.C.	Public Notice and Comment
62-210.350(1), F.A.C.	Public Notice of Proposed Agency Action
62-210.350(2), F.A.C.	Additional Public Notice Requirements for Emissions Units Subject to Prevention of Significant Deterioration or Nonattainment-Area Preconstruction Review
62-210.350(3), F.A.C.	Additional Public Notice Requirements for Sources Subject to Operation Permits for Title V Sources
62-210.360, F.A.C.	Administrative Permit Corrections
62-210.370(3), F.A.C.	Annual Operating Report for Air Pollutant Emitting Facility
62-210.400, F.A.C.	Emission Estimates
62-210.650, F.A.C.	Circumvention
62-210.700, F.A.C.	Excess Emissions
62-210.900, F.A.C.	Forms and Instructions
62-210.900(1), F.A.C.	Application for Air Permit – Title V Source, Form and Instructions
62-210.900(5), F.A.C.	Annual Operating Report for Air Pollutant Emitting Facility, Form and Instructions
62-210.900(7), F.A.C.	Application for Transfer of Air Permit – Title V and non-Title V Source

CHAPTER 62-212, F.A.C.: STATIONARY SOURCES – PRECONSTRUCTION REVIEW, effective 08-17-00

State:	*(description)*
CHAPTER 62-213, F.A.C.: OPERATION PERMITS FOR MAJOR SOURCES OF AIR POLLUTION, effective 04-16-01	
62-213.205, F.A.C.	Annual Emissions Fee
62-213.400, F.A.C.	Permits and Permit Revisions Required
62-213.410, F.A.C.	Changes without Permit Revision
62-213.412, F.A.C.	Immediate Implementation Pending Revision Process
62-213.415, F.A.C.	Trading of Emissions within a Source
62-213.420, F.A.C.	Permit Applications
62-213.430, F.A.C.	Permit Issuance, Renewal, and Revision
62-213.440, F.A.C.	Permit Content
62-213.450, F.A.C.	Permit Review by EPA and Affected States
62-213.460, F.A.C.	Permit Shield
62-213.900, F.A.C.	Forms and Instructions
62-213.900(1), F.A.C.	Major Air Pollution Source Annual Emissions Fee Form
62-213.(7), F.A.C.	Statement of Compliance Form
CHAPTER 62-296, F.A.C.: STATIONARY SOURCES – EMISSION STANDARDS, effective 03-02-99	
62-296.320(4), F.A.C.	Unconfined Emissions of Particulate Matter
62-263.320(2), F.A.C.	Objectionable Odor Prohibited
CHAPTER 62-297, F.A.C.: STATIONARY SOURCES – EMISSIONS MONITORING, effective 03-02-99	
62-297.310, F.A.C.	General Test Requirements
62-297.330, F.A.C.	Applicable Test Procedures
62-297.340, F.A.C.	Frequency of Compliance Tests
62-297.345, F.A.C.	Stack Sampling Facilities Provided by the Owner of an Emissions Unit
62-297.350, F.A.C.	Determination of Process Variables
62-297.570, F.A.C.	Test Report
62-297.620, F.A.C.	Exceptions and Approval of Alternate Procedures and Requirements

Miscellaneous:	
CHAPTER 28-106, F.A.C.	Decisions Determining Substantial Interests
CHAPTER 62-110, F.A.C.	Exception to the Uniform Rules of Procedure, effective 07-01-98
CHAPTER 62-256, F.A.C.	Open Burning and Frost Protection Fires, effective 11-30-94
CHAPTER 62-257, F.A.C.	Asbestos Notification and Fee, effective 02-09-99
CHAPTER 62-281, F.A.C.	Motor Vehicle Air Conditioning Refrigerant Recovery and Recycling, effective 09-10-96

ATTACHMENT TM-FI-CV3

COMPLIANCE REPORT AND PLAN

ATTACHMENT TM-FI-CV3

COMPLIANCE REPORT AND PLAN

Titan America, LLC, certifies that the Pennsuco Portland cement manufacturing plant in Medley, Florida, as of the date of this application, is in compliance with each applicable requirement addressed in this Title V air permit application, except those deviations attached.

I, the undersigned, am the responsible official as designed in Chapter 62-213, F.A.C., of the Title V source for which this report is being submitted. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made and data contained in this report are true, accurate, and complete.

Compliance statements for this facility will be submitted on an annual basis to FDEP, before March 1st of each year.

Signature, Responsible Official	Date

ATTACHMENT TM-FI-CV3

COMPLIANCE REPORT AND PLAN

Titan America, LLC, certifies that the Pennsuco Portland cement manufacturing plant in Medley, Florida, as of the date of this application, is in compliance with each applicable requirement addressed in this Title V air permit application, except those deviations attached.

I, the undersigned, am the responsible official as designed in Chapter 62-213, F.A.C., of the Title V source for which this report is being submitted. I hereby certify, based on information and belief formed after reasonable inquiry, that the statements made and data contained in this report are true, accurate, and complete.

Compliance statements for this facility will be submitted on an annual basis to FDEP, before March 1st of each year.

Signature, Responsible Official Date

COMPLIANCE AUDIT -- DEVIATION LISTING

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
Subpart LLL Requirements							
40 CFR 63.1343(b)(1)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain PM less than or equal to 0.15 kg per Mg (0.30 lb per ton) of feed (dry basis) to the kiln?	A Nov. 2005 Method 5 performance test demonstrated compliance with this standard.	Y	M	O	EL	K
40 CFR 63.1343(b)(2)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) exhibit opacity less than or equal to 20 percent?	A COMs monitors opacity to ensure opacity is less than 10% (clinker cooler exhausts to the main kiln stack).	Y	M	O	EL	K
40 CFR 63.1343(b)(3)(i)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.20 ng per dscm (8.7×10^{-11} gr per dscf) TEQ corrected to seven percent oxygen? Option: 40 CFR 63.1343(b)(3)(ii)		NA	M	O	EL	K
40 CFR 63.1343(b)(3)(ii)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.40 ng per dscm (1.7×10^{-10} gr per dscf) TEQ, corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the PMCD is 204 degrees C or less? Option: 40 CFR 63.1343(b)(3)(i)	A Nov. 2005 D/F performance test demonstrated compliance with this standard.	Y	M	O	EL	K
40 CFR 63.1343(c)(1)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain PM less than or equal to 0.15 kg per Mg (0.30 lb per ton) of feed (dry basis) to the kiln?		NA	M	O	EL	GK
40 CFR 63.1343(c)(2)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) exhibit opacity less than or equal to 20 percent?		NA	M	O	EL	GK
40 CFR 63.1343(c)(3)(i)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.20 ng per dscm (8.7×10^{-11} gr per dscf) TEQ corrected to seven percent oxygen? Option: 40 CFR 63.1343(c)(3)(ii)		NA	M	O	EL	GK

Compliance Event		Requirement Type	Affected Source	
I = Initial	CSM = Startup/Shutdown/Malfunction	EL = Emission Limit	A = All	CC = Clinker Cooler
O = Ongoing	CFS = Feed Switch	MO = Monitoring	BRD = brownfield raw material dryer	RFM = raw OR finish mill
PT = Performance Testing	CAL = Alternative Modeling	RK = Recordkeeping	GRD = greenfield raw material dryer	MHO = materials handling operations
CEX = Compliance Extension	CCO = Construction/Mods	RP = Reporting	K = kiln OR in-line kiln/raw mill, including alkali bypass (if present)	
		WP = Work Practice	IK = in-line kiln/raw mill, including alkali bypass (if present)	

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1343(c)(3)(ii)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.40 ng per dscm (1.7×10^{-10} gr per dscf) TEQ, corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the PMCD is 204 degrees C or less? Option: 40 CFR 63.1343(c)(3)(i)		NA	M	O	EL	GK
40 CFR 63.1343(c)(4)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain THC less than or equal to 50 ppmvd as propane, corrected to 7 percent oxygen?		NA	M	O	EL	GK
40 CFR 63.1343(d)(1)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.20 ng per dscm (8.7×10^{-11} gr per dscf) TEQ corrected to seven percent oxygen? Option: 40 CFR 63.1343(d)(2)		NA	A	O	EL	K
40 CFR 63.1343(d)(2)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.40 ng per dscm (1.7×10^{-10} gr per dscf) TEQ, corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the PMCD is 204 degrees C or less? Option: 40 CFR 63.1343(d)(1)		NA	A	O	EL	K
40 CFR 63.1343(e)(1)(i)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.20 ng per dscm (8.7×10^{-11} gr per dscf) TEQ corrected to seven percent oxygen? Option: 40 CFR 63.1343(e)(1)(ii)		NA	A	O	EL	GK
40 CFR 63.1343(e)(1)(ii)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain D/F less than or equal to 0.40 ng per dscm (1.7×10^{-10} gr per dscf) TEQ, corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the PMCD is 204 degrees C or less? Option: 40 CFR 63.1343(e)(1)(i)		NA	A	O	EL	GK
40 CFR 63.1343(e)(2)	Does the kiln or in-line kiln/raw mill exhaust, including the alkali bypass (if present) contain THC less than or equal to 50 ppmvd as propane, corrected to 7 percent oxygen?		NA	A	O	EL	GK
40 CFR 63.1344(a)	Is the temperature of the inlet gas to the kiln PMCD and alkali bypass PMCD (if present) less than or equal to the temperature limit established during the performance test [as specified in 40 CFR 63.1349(b)(3)(iv)]?		NA	M	O	WP	K

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1344(a)(1)	Is the temperature of the in-line kiln/raw mill exhaust, when the raw mill is operating, less than or equal to the temperature limit established during the performance test [as specified in 40 CFR 63.1349(b)(3)(iv)]?	A thermocouple measures the temperature of the inlet gas to the kiln PMCD. The facility has operated in exceedance of the temperature limit for the mill on scenario (203.9 F). Retested 11/2005; set new limits.	N	M	O	WP	IK
40 CFR 63.1344(a)(2)	Is the temperature of the in-line kiln/raw mill exhaust, when the raw mill is not operating, less than or equal to the temperature limit established during the performance test [as specified in 40 CFR 63.1349(b)(3)(iv)]?		Y	M	O	WP	IK
40 CFR 63.1344(a)(3)	If an alkali bypass is present, is the temperature of the alkali bypass exhaust, either with or without the raw mill operating, less than or equal to the temperature limit established during the performance test [as specified in 40 CFR 63.1349(b)(3)(iv)]?		NA	M	O	WP	IK
40 CFR 63.1345(a)(1)	Does the clinker cooler exhaust contain PM less than or equal to 0.050 kg per Mg (0.10 lb per ton) of feed (dry basis) to the kiln?		NA	M	O	EL	CC
40 CFR 63.1345(a)(2)	Does the clinker cooler exhaust exhibit opacity less than or equal to 10 percent?		NA	M	O	EL	CC
40 CFR 63.1346(a)	Does the raw material dryer exhaust exhibit opacity less than or equal to 10 percent?		NA	M	O	EL	BR D
40 CFR 63.1346(b)	Does the raw material dryer exhaust contain THC less than or equal to 50 ppmvd as propane, corrected to 7 percent oxygen?		NA	A	O	EL	GR D
40 CFR 63.1346(c)(1)	Does the raw material dryer exhaust contain THC less than or equal to 50 ppmvd as propane, corrected to 7 percent oxygen?		NA	M	O	EL	GR D
40 CFR 63.1346(c)(2)	Does the raw material dryer exhaust exhibit opacity less than or equal to 10 percent?		NA	M	O	EL	GR D

COMPLIANCE AUDIT DEVIATION LISTING

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1347	Does the mill sweep or air separator APCD exhaust of the raw or finish mill exhibit opacity less than or equal to 5 percent?		Y	M	O	EL	RF M
40 CFR 63.1348	Does the exhaust from materials handling operations exhibit opacity less than or equal to 5 percent?	Monthly 1-minute Method 22s need to be conducted and documented. Missing June/Nov.	N	M	O	EL	MH O
40 CFR 63.1349(a)(1)	Is a brief description of the process and the air pollution control system contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(10)	Is any other information required by the test method and not otherwise required under 63.1349(a)(1)-(9) contained in the performance test report?		NA	M/A	PT	RK	A
40 CFR 63.1349(a)(2)	Is the sampling location description(s) contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(3)	Is a brief description of the process and the air pollution control system contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(4)	Are the test results contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(5)	Are the quality assurance procedures and results contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(6)	Are records of the operating conditions during the test, preparation of standards, and calibration procedures contained in the performance test report?		Y	M/A	PT	RK	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1349(a)(7)	Are raw data sheets for field sampling, and field and laboratory analyses contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(8)	Is documentation of calculations contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(a)(9)	Are all data recorded and used to establish parameters for compliance monitoring contained in the performance test report?		Y	M/A	PT	RK	A
40 CFR 63.1349(b)(1)(i)	Was EPA Method 5 used to determine PM emissions? Did the performance test consist of three separate runs under the conditions that exist when the clinker cooler is operating at the representative performance conditions? Was each run conducted for at least one hour, with a minimum sample volume of 0.85 dscm? NOTE: the average of the three runs is used to determine compliance. Further, a determination of the PM collected in the impingers ("back half") of the Method 5 particulate sampling train is not required to demonstrate initial compliance.		Y	M	PT	MO	CC
40 CFR 63.1349(b)(1)(i)	Was EPA Method 5 used to determine PM emissions? Did the performance test consist of three separate runs under the conditions that exist when the kiln is operating at the representative performance conditions? Was each run conducted for at least one hour, with a minimum sample volume of 0.85 dscm? NOTE: the average of the three runs is used to determine compliance. Further, a determination of the PM collected in the impingers ("back half") of the Method 5 particulate sampling train is not required to demonstrate initial compliance.		NA	M	PT	MO	K
40 CFR 63.1349(b)(1)(i)	Was EPA Method 5 used to determine PM emissions while the raw mill was operating under normal conditions AND while the raw mill was not operating? In each case did the performance test consist of three separate runs under the conditions that exist when the in-line kiln is operating at the representative performance conditions? Was each run conducted for at least one hour, with a minimum sample volume of 0.85 dscm? NOTE: the average of the three runs is used to determine compliance. Further, a determination of the PM collected in the impingers ("back half") of the Method 5 particulate sampling train is not required to demonstrate initial compliance.	Method 5 testing was conducted again in 11/2005; Jan. to Nov. 2005.	N	M	PT	MO	IK

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1349(b)(1)(ii)	For each run were suitable methods used to determine the kiln or in-line kiln/raw mill feed rate, except for fuels?		Y	M	PT	MO	K
40 CFR 63.1349(b)(1)(ii)	For each run were suitable methods used to determine the kiln or in-line kiln/raw mill feed rate, except for fuels?		NA	M	PT	MO	CC
40 CFR 63.1349(b)(1)(iii)	For each run was the PM emission rate computed using this equation? $E = (C_s Q_{sd})/P$, where E = PM emission rate (kg/Mg of kiln feed); c_s = PM concentration (kg/dscm); Q_{sd} = volumetric flow rate of effluent gas (dscm/hr); and P = total kiln feed on a dry basis (Mg/hr).		Y	M	PT	MO	K
40 CFR 63.1349(b)(1)(iii)	For each run was the PM emission rate computed using this equation? $E = (C_s Q_{sd})/P$, where E = PM emission rate (kg/Mg of kiln feed); c_s = PM concentration (kg/dscm); Q_{sd} = volumetric flow rate of effluent gas (dscm/hr); and P = total kiln feed on a dry basis (Mg/hr).		NA	M	PT	MO	CC
40 CFR 63.1349(b)(1)(iv)	If an alkali bypass is present, were the main exhaust and alkali bypass tested simultaneously, and for each run was the PM emission rate computed using this equation? $E_c = (C_{sk}Q_{sdk} + c_{sb}Q_{sdb})/P$, where E_c = combined PM emission rate from the kiln or in-line kiln/raw mill and bypass stack (kg/Mg of kiln feed); c_{sk} = PM concentration in the kiln or in-line kiln/raw mill effluent (kg/dscm); Q_{sdk} = volumetric flow rate of the kiln or in-line/kiln raw mill effluent (dscm/hr); c_{sb} = PM concentration in the alkali bypass gas (kg/dscm); Q_{sdb} = volumetric flow rate of the alkali bypass gas and P = total kiln feed on a dry basis (Mg/hr).		NA	M	PT	MO	K
40 CFR 63.1349(b)(1)(v)	Was a COM used to determine opacity during the performance test? During each run was the maximum six-minute average opacity determined and used to demonstrate compliance? Option: 40 CFR 63.1349(b)(1)(vi), if the kiln or in-line kiln/raw mill control device exhausts through a monovent, or if the use of a COM in accordance with PS-1 of appendix B to part 60 is not feasible. Further, option may be used if the source has a fabric filter with multiple stacks or an electrostatic precipitator with multiple stacks.		Y	M	PT	MO	K
40 CFR 63.1349(b)(1)(vi)	Was a Method 9 test used to determine opacity during the performance test? During each run was the maximum six-minute average opacity determined and used to demonstrate compliance? Option: 40 CFR 63.1349(b)(1)(v)		NA	M	PT	MO	K

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1349(b)(2)	Was a Method 9 test used to determine opacity during the performance test? Was the performance test conducted when the operations were at the representative performance conditions? Was the maximum six-minute average opacity determined and used to demonstrate compliance? Was the duration of the Method 9 performance test 3-hours (30 six-minute averages)? Exception: the duration of the Method 9 test may be one-hour if there were no individual readings greater than 10 percent AND there were no more than 3 readings of 10 percent for the first one-hour period. Option: 40 CFR 63.1349(b)(1)(v)		Y	M	PT	MO	MH O
40 CFR 63.1349(b)(3)	For in-line kiln/raw mills, was a separate test conducted while the raw mill was under normal operating conditions AND while the raw mill was not operating?		Y	M/A	PT	MO	IK
40 CFR 63.1349(b)(3) 40 CFR 63.1349(b)(3)(i)	Was Method 23 used for D/F testing? Were three separate runs conducted, while the kiln or in-line kiln/raw mill was operating at the highest load or capacity level reasonably expected to occur? For each run was the duration at least three hours, and the sample volume 2.5 dscm? Was compliance based on the arithmetic average of the three measured concentrations? If an alkali bypass is present, was a simultaneous test performed for the bypass, either with or without the raw mill operating?	Method 23 was used for the D/F performance test. The performance test for the mill on scenario consisted of 3 test runs. However, the mill off scenario consisted of only 2 test runs. Retested Nov. 2005.	N	M/A	PT	MO	K
40 CFR 63.1349(b)(3)(ii)	Was the temperature at the inlet to the PMCD and the temperature at the inlet to the alkali bypass (if present) PMCD continuously recorded during the test?		Y	M/A	PT	MO	K
40 CFR 63.1349(b)(3)(ii)	Are the continuous temperature record, the run average temperatures, and the average run average temperatures included in the performance test report?		Y	M/A	PT	RK	K
40 CFR 63.1349(b)(3)(iii)	Were one-minute average temperatures calculated for each minute of each test run?		N	M/A	PT	MO	K
40 CFR 63.1349(b)(3)(iv)	Was the run average temperature calculated for each run, and the average of the run average temperatures determined? NOTE: This defines the applicable temperature limit in accordance with 63.1344(b).		Y	M/A	PT	MO	K

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1349(b)(4)	Is a CEM operated in accordance with PS-8A of appendix B to part 60? Was the duration of the test three hours? Was the average THC concentration calculated, based on the one-minute averages? For in-line kiln/raw mills, was a separate test conducted while the raw mill was under normal operating conditions AND while the raw mill was not operating?		NA	M/A	PT	MO	GK/GRD
40 CFR 63.1349(c)	Has a performance test for opacity been conducted every five years?		Y	M	PT	MO	MHO
40 CFR 63.1349(c)	Has a performance test for PM been conducted every five years?		Y	M	PT	MO	K
40 CFR 63.1349(d)	Has a performance test for D/F been conducted every 30 months?		Y	M/A	PT	MO	K
40 CFR 63.1349(e)	Has there been any significant change in operations that may adversely affect compliance since the last performance test? If so, has a new test for PM been conducted within 90 days of initiating the significant change in operations?		NA	M	CFS	MO	K
40 CFR 63.1349(e)	Has there been any significant change in operations that may adversely affect compliance since the last performance test? If so, has a new test for D/F been conducted within 90 days of initiating the significant change in operations?		NA	M/A	CFS	MO	K
40 CFR 63.1349(e)(3)	If a pretest was conducted due to an operational change, was it less than 360 hours? Was temperature and other monitoring data recorded during the pretest operations?	A pretest was not conducted.	NA	M/A	CFS	MO	K
40 CFR 63.1349(e)(3)(i)	If an operational change was made that adversely affected compliance was the Administrator provided written notice at least 60 days in advance? Did the notice include a description of the planned change, the emissions standards that would be affected, and a schedule for completion of the performance test?	No applicable events have occurred.	NA	M/A	CFS	MO	K
40 CFR 63.1349(e)(3)(ii)	Were the performance test results documented in a complete test report?	No applicable events have occurred.	NA	M/A	CFS	MO	K
40 CFR 63.1349(e)(3)(iii)	Was the test plan made available to the Administrator prior to the testing, if requested?	No applicable events have occurred.	NA	M/A	CFS	MO	K

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1349(e)(3)(iv)	Was the performance test completed within 360 hours after the planned operational change period?	No applicable events have occurred.	NA	M/A	CFS	MO	K
40 CFR 63.1350(a)	Has the Operations and Maintenance Plan been submitted to EPA?	An O&M Plan has not been submitted to the EPA. Revision submitted 2/2006.	N	M/A	I	RP	A
40 CFR 63.1350(a)(1)	Has an Operations and Maintenance Plan been prepared and does it contain the procedures for proper operation and maintenance of the sources and APCDs, in order to meet the applicable emission and operating limits? O&M Plan prepared; submitted 2/2006.	Existing procedures implemented by the plant for proper operation and maintenance of the sources and APCDs shall be documented in the plan.	N	M/A	O	RK	A
40 CFR 63.1350(a)(2)	Has an Operations and Maintenance Plan been prepared and does it contain a description of the corrective actions to be taken, when required?	O&M Plan prepared; submitted 2/2006.	N	M/A	O	RK	A
40 CFR 63.1350(a)(3)	Has an Operations and Maintenance Plan been prepared and does it contain the procedures to be used during an inspection of the components of the combustion system of each kiln and each in-line kiln raw mill located at the facility, at least once per year? O&M Plan prepared; submitted 2/2006.		N	M/A	O	RK	A
40 CFR 63.1350(a)(4)	Has an Operations and Maintenance Plan been prepared and does it contain the procedures to be used to periodically monitor the sources subject to the opacity standards under 63.1346 and 63.1348? O&M Plan prepared; submitted 2/2006.		N	M/A	O	RK	A
40 CFR 63.1350(a)(4)(i)-(iii)	While in operation, have one-minute visible emissions tests of the sources been conducted, in accordance with Method 22? Has the testing occurred on a monthly basis for those sources for which there is *not a record* of no visible emissions for six consecutive monthly tests? Has the testing occurred semi-annually for those sources for which no visible emissions have been observed in six consecutive monthly tests? Has the testing occurred annually for those sources for which no visible emissions have been observed during a semi-annual test? NOTE: if visible emissions are observed during any Method 22 test, testing must resume on a monthly basis until no visible emissions are observed in six consecutive monthly tests.		NA	M	O	MO	BR D

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(a)(4)(i)-(iii)	While in operation, have one-minute visible emissions tests of the sources been conducted, in accordance with Method 22? Has the testing occurred on a monthly basis for those sources for which there is *not a record* of no visible emissions for six consecutive monthly tests? Has the testing occurred semi-annually for those sources for which no visible emissions have been observed in six consecutive monthly tests? Has the testing occurred annually for those sources for which no visible emissions have been observed during a semi-annual test? NOTE: if visible emissions are observed during any Method 22 test, testing must resume on a monthly basis until no visible emissions are observed in six consecutive monthly tests.		N	M	O	MO	MH O
40 CFR 63.1350(a)(4)(i)-(iii)	While in operation, have one-minute visible emissions tests of the sources been conducted, in accordance with Method 22? Has the testing occurred on a monthly basis for those sources for which there is *not a record* of no visible emissions for six consecutive monthly tests? Has the testing occurred semi-annually for those sources for which no visible emissions have been observed in six consecutive monthly tests? Has the testing occurred annually for those sources for which no visible emissions have been observed during a semi-annual test? NOTE: if visible emissions are observed during any Method 22 test, testing must resume on a monthly basis until no visible emissions are observed in six consecutive monthly tests.		NA	M	O	MO	GR D
40 CFR 63.1350(a)(4)(iv)	If visible emissions have been observed during a test, has a six-minute Method 9 test been conducted within one hour of observing the visible emissions?		NA	M	O	MO	BR D
40 CFR 63.1350(a)(4)(iv)	If visible emissions have been observed during a test, has a six-minute Method 9 test been conducted within one hour of observing the visible emissions?	Procedures are not in place to require a 6-minute Method 9 within 1-hour of observing VEs. (Jan.-Dec.)	N	M	O	MO	MH O
40 CFR 63.1350(a)(4)(iv)	If visible emissions have been observed during a test, has a six-minute Method 9 test been conducted within one hour of observing the visible emissions?		NA	M	O	MO	GR D
40 CFR 63.1350(a)(4)(v)	Are the enclosures for totally enclosed conveying system transfer points operated and maintained as total enclosures on a continuing basis in accordance with the O&M plan?	O&M Plan prepared; submitted 2/2006.	N	M	O	MO	MH O

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(a)(4)(vi)	If the facility has any partially enclosed or unenclosed conveying system transfer point in a building, was a Method 22 visible emissions test conducted for each conveying system itself or for the building? (Option 63.150(a)(4)(vii))		NA	M	O	MO	MH O
40 CFR 63.1350(a)(4)(vii)	If the visible emissions from the building were monitored, were the visible emissions tested from each side, roof and vent of the building for at least one minute during normal operating conditions?		NA	M	O	MO	MH O
40 CFR 63.1350(b)	Does the source comply with all provisions of the Operations and Maintenance Plan developed under 40 CFR 63.1350(a)?	O&M Plan prepared; submitted 2/2006.	N	M/A	O	WP	A
40 CFR 63.1350(c)(1)	Has a COM been calibrated, maintained and continuously operated at the outlet of the PMCD, in accordance with PS-1 and with subpart A of 40 CFR 63? Has opacity been monitored at each point where emissions are vented, including alkali bypasses (if present)? Option: 40 CFR 63.1350(c)(2)(i)-(ii), if the control device exhausts through a monovent, or if use of a COM in accordance with the specifications of PS-1 is not feasible.		Y	M	O	MO	K
40 CFR 63.1350(c)(2)(i)-(ii)	If the source uses a fabric filter with multiple stacks, or an ESP with multiple stacks, are daily Method 9 tests of each stack conducted while the source is operating at the representative performance conditions? Has the duration of the Method 9 test been at least 30 minutes? Have Method 9 procedures been used to monitor and record the average opacity for each six-minute period during the test?		NA	M	O	MO	K
40 CFR 63.1350(c)(3)	Is compliance with the 20 percent opacity standard determined by the average opacity for *any* six-minute block period within the test period?	Compliance with the 10% opacity standard (clinker cooler exhausts to the main kiln stack) is determined by the average opacity for any 6-minute block period. There are some deviations that occur during operations.	Y	M	O	MO	K
40 CFR 63.1350(d)(1)	Has a COM been calibrated, maintained and continuously operated at the outlet of the PMCD, in accordance with PS-1 and with subpart A of 40 CFR 63? Has opacity been monitored at each point where emissions are vented? Option: 40 CFR 63.1350(c)(2)(i)-(ii), if the control device exhausts through a monovent, or if use of a COM in accordance with the specifications of PS-1 is not feasible.	The clinker cooler vents to the main kiln stack, where, at the outlet of the baghouse, a COMS is continuously operated. There is no evidence that the performance evaluation on the COMs was performed.	NA	M	O	MO	CC

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(d)(2)(i)-(ii)	If the source uses a fabric filter with multiple stacks, or an ESP with multiple stacks, are daily Method 9 tests of each stack conducted while the source is operating at the representative performance conditions? Has the duration of the Method 9 test been at least 30 minutes? Have Method 9 procedures been used to monitor and record the average opacity for each six-minute period during the test?		NA	M	O	MO	CC
40 CFR 63.1350(d)(3)	Is compliance with the 10 percent opacity standard determined by the average opacity for *any* six-minute block period within the test period?		NA	M	O	MO	CC
40 CFR 63.1350(e)	Has a daily Method 22 test of the mill sweep and air separator PMCDs been conducted while the source is operating at the representative performance conditions? Has the duration of the Method 22 test been 6 minutes?	Procedures were not in place Jan.-Sept. 2005.	N	M	O	MO	RF M
40 CFR 63.1350(e)(1)-(2)	If visible emissions were observed during a Method 22 test, was a follow-up Method 22 test of each stack from which visible emissions were previously observed conducted within 24 hours? If visible emissions were observed on the same stacks during the follow-up Method 22, was a 30 minute Method 9 test of each stack from which visible emissions were observed conducted within 24-hours?	Procedures were not in place to require a follow-up Method 22 test within 24 hours, if VEs are observed. If VEs are observed during the follow-up Method 22, procedures are not in place to require a 30-minute Method 9 test.	N	M	O	MO	RF M
40 CFR 63.1350(f)(1)	Has a monitor been calibrated, maintained and continuously operated to record the temperature of the kiln, in-line kiln/raw mill and alkali bypass (if present) exhaust gas at the inlet to, or upstream of, the associated PMCDs?	Corrected 4th quarter 2005. Quarterly calibrations of the thermocouple have not been performed and there is no proof that the existing thermocouple is NIST certified.	N	M/A	O	MO	K
40 CFR 63.1350(f)(1)(i)	Does the recorder have a response range that includes zero and 1.5 times the run average temperatures AND average run average temperature determined from the performance test?		Y	M/A	O	MO	K

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(f)(1)(ii)	Is the reference method a National Institute of Standards and Technology calibrated reference thermocouple-potentiometer system or alternate reference approved by the EPA?	It does not appear that the existing thermocouple is NIST certified. Corrected 4th quarter 2005.	N	M/A	O	MO	K
40 CFR 63.1350(f)(2)	Has the temperature of the kiln, in-line kiln/raw mill and alkali bypass (if present) exhaust gas at the inlet to, or upstream of, the associated PMCDs been continuously recorded?		Y	M/A	O	RK	K
40 CFR 63.1350(f)(3)-(4)	Is the three-hour rolling average temperature calculated as the average of 180 successive one-minute average temperatures, ignoring periods of time when one-minute averages are not available?		Y	M/A	O	MO	K
40 CFR 63.1350(f)(5)	Was the calculation of the three-hour rolling average temperature begun anew whenever the operating status of the raw mill was changed from on to off or vice versa? Reconfigured DAHS in Oct. 2005.	It is believed that the 3-hour rolling average temperature is not being reset whenever the raw mill on/off status changes.	N	M/A	O	MO	K
40 CFR 63.1350(f)(6)	Has the calibration of all thermocouples and other temperature sensors been verified at least once every three months?		N	M/A	O	MO	K
40 CFR 63.1350(h)(1)	Has a THC CEM been maintained and continuously operated in accordance with PS-8A and with subpart A of 40 CFR 63? NOTE: the calculation of hourly rolling averages in accordance with section 4.9 of PS-8A is not required.		NA	M/A	O	MO	GK/ GR D
40 CFR 63.1350(h)(3)	Is compliance with the THC emission limit of 50 ppmvd determined from any thirty-day block average THC concentration of any exhaust gas from the raw material dryer, and the main exhaust of the kiln or in-line kiln/raw mill?		NA	M/A	O	MO	GK/ GR D
40 CFR 63.1350(h)(3)(i)	Has an inspection of the components of the combustion system been conducted at least once per year?		Y	M/A	O	MO	K
40 CFR 63.1350(j)	Has opacity been monitored in accordance with the PC MACT, as specified in the Operations and Maintenance Plan?		NA	M	O	MO	BR D
40 CFR 63.1350(j)	Has opacity been monitored in accordance with the PC MACT, as specified in the Operations and Maintenance Plan?	An O&M Plan has been prepared and submitted 2/2006.	N	M	O	MO	MH O

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(j)	Has opacity been monitored in accordance with the PC MACT, as specified in the Operations and Maintenance Plan?		NA	M	O	MO	GR D
40 CFR 63.1350(k)	Has a PM CEM been calibrated, maintained and continuously operated? NOTE: The compliance deadline for installing the PM CEMS and all requirements relating to its performance and implementation is deferred pending further rulemaking.		NA	M	O	MO	K
40 CFR 63.1350(l)(1)	Has the plant requested an alternative monitoring requirement? If so, and if an alternate (longer) averaging period is being used, is it documented that a longer averaging period will ensure that emissions do not exceed levels achieved during the performance test over any increment of time equivalent to the time required to conduct three runs of the performance test?		NA	M/A	CAL	MO	A
40 CFR 63.1350(l)(2)	Has the plant requested an alternative monitoring requirement? If so, was the original monitoring requirement, as specified in the rule, used until approval to use an alternate monitoring requirement was received?		NA	M/A	CAL	MO	A
40 CFR 63.1350(l)(3)	Has the plant requested an alternative monitoring requirement? Was the application for approval of alternate monitoring requirement(s) submitted no later than the notification of the performance test?		NA	M/A	CAL	RP	A
40 CFR 63.1350(l)(3)(i)-(iii)	Has the plant requested an alternative monitoring requirement? Does the application for approval of alternate monitoring requirements contain: (1) information justifying the request; (2) a description of the proposed alternative monitoring requirement, including the operating parameter to be monitored, the monitoring approach and technique, the averaging period for the limit, and how the limit is to be calculated; and (3) documentation that the alternative monitoring requirement would provide equivalent or better assurance of compliance with the relevant emission standard.		NA	M/A	CAL	RK	A
40 CFR 63.1350(m)	If a method 22 test was not conducted on the raw mill or finish mill, is it equipped with a continuous opacity monitoring system or a bag leak detection system (BLDS)? Was the opacity maintained such that the 6-minute average opacity for any 6-minute block did not exceed 10 percent?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(1)	If a BLDS is used, is it capable of detecting PM emissions at concentrations of 10mg/acm or less?		NA	M	O	MO	RF M

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1350(m)(2)	Does the sensor on the BLDS provide output of relative PM emissions?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(3)	Does the BLDS have an alarm that will automatically activate when it detects a significant increase in relative PM emissions greater than a preset level?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(4)	Is the presence of an alarm condition clearly apparent to facility operating personnel?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(5)	If a positive-pressure fabric filter is used, does each compartment have a bag leak detector? If a negative-pressure or induced-air fabric filter is used, is the bag leak detector installed downstream of the fabric filter?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(6)	Are all BLDS's installed, operated and maintained based on the manufacturer's written specifications and recommendations?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(7)	Is the baseline output of the BLDS established by adjusting the range and averaging period of the device and establishing the alarm set points and alarm delay times?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(8)	After the initial adjustment, were the range, averaging period, alarm set points or alarm delay time adjusted according to the operations and maintenance plan? Was the range increased by less than 100 percent or decreased by less than 50 percent over 1 calendar year period? If so, was it certified in writing to the Administrator that the fabric filter was inspected and found to be in good operating conditions?		NA	M	O	MO	RF M
40 CFR 63.1350(m)(9)	Was the bag leak detector alarm activated and alarm conditions exist for less than 5 percent of the total operating time in a 6-month block period? Was the output of the BLDS continuously recorded during periods of normal operation?		NA	M	O	MO	RF M
40 CFR 63.1353(b)(1)	Has the facility complied with the initial notifications required by 63.9(b) through (d)? NOTE: a Title V permit application may be used in lieu of the initial notification required under this rule provided it contains the same information.		N	M/A	I	RP	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1353(b)(2)	Has the facility complied with the performance test notifications required by 63.7 and 63.9(e)?		Y	M/A	O	RP	A
40 CFR 63.1353(b)(3)	Has the facility complied with the notifications for opacity and visible emission observations required by 63.6(h)(5) and 63.9(f)?		Y	M/A	O	RP	A
40 CFR 63.1353(b)(4)	Has the facility made notification of the date the continuous emission monitor (CEM) performance evaluation is scheduled to begin?		NA	M/A	O	RP	A
40 CFR 63.1353(b)(5)	Has the facility made notification of its compliance status, as required by 63.9(h)?		Y	M/A	O	RP	A
40 CFR 63.1354(b)(1)	Have the results of performance tests been reported along with the Notification of Compliance Status?		Y	M/A	PT	RP	A
40 CFR 63.1354(b)(10)	If the total continuous monitoring system downtime for any CEM or any continuous monitoring system (CMS) for the reporting period is ten percent or greater of the total operating time for the reporting period, was an excess emissions and continuous monitoring system performance report submitted along with the summary report required by 40 CFR 63.1354(b)(9)?	Semi-annual summary reports have not been submitted. If the total thermocouple or COMs downtime for the period is equal to or greater than 10%, an excess emissions and CMS performance report shall be submitted with the summary report.	N	M/A	O	RP	A
40 CFR 63.1354(b)(2)	Have the opacity performance test results been reported as required by 63.10(d)(3)?		Y	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1354(b)(3)	Has the facility requested a compliance extension? If so, have the progress reports required as a condition of receiving an extension been submitted by the dates specified in the written extension of compliance?		NA	M/A	CEX	RP	A
40 CFR 63.1354(b)(4)	If a startup, shutdown, or malfunction occurred during the reporting period, and if actions taken were consistent with the Startup, Shutdown and Malfunction Plan, was such information stated in a semiannual reported submitted to the delegated authority?	A SSM Plan has not been prepared. SSM events that occurred during the period must be included in the summary report, which is submitted to DERM semi-annually.	N	M/A	CSM	RP	A
40 CFR 63.1354(b)(5)	If a startup, shutdown, or malfunction occurred and the actions taken were not consistent with the Startup, Shutdown and Malfunction Plan, was a report stating the actions taken submitted within 2 working days, followed by a certified letter explaining the circumstances of the event, the reasons for not following the startup, shutdown, and malfunction plan, and whether any excess emissions and/or parameter monitoring exceedances are believed to have occurred?	A SSM Plan has not been prepared. Report SSM events where actions taken were not consistent with plan within 2 working days. A follow-up certified letter with the required information must also be submitted.	N	M/A	CSM	RP	A
40 CFR 63.1354(b)(6)	Has a report of the performance evaluation results for the continuous monitoring system been submitted simultaneously with the results of the performance test?		Y	M/A	O	RP	A
40 CFR 63.1354(b)(7)	If a COM is used to determine compliance during any performance test, have the results of the COM system performance evaluation been reported?		Y	M/A	PT	RP	A
40 CFR 63.1354(b)(8)	If a CEM is used and an exceedance was observed, was an excess emissions and continuous monitoring system performance report submitted for any event when the continuous monitoring system data indicated that the source was not in compliance with the applicable emission limitation or operating parameter limit?	Quarterly and semi-annual reports will be submitted on time.	N	M/A	O	RP	A
40 CFR 63.1354(b)(9)	Has a semiannual report been submitted, containing the information specified in 40 CFR 63.10(e)(3)(vi) and (1) all exceedances of maximum control device inlet gas temperature limits specified in 63.1344(a) and (b); (2) all failures to calibrate thermocouples and other temperature sensors as required under 63.1350(f)(7) of this subpart; (3) the results of any combustion system component inspections conducted within the reporting period as required under 63.1350(i); and (4) all failures to comply with any provision of the operation and maintenance plan developed in accordance with 63.1350(a)?	There is no evidence that a semi-annual report including the required information has been submitted.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1355(a)	Does the facility maintain files of all information (including all reports and notifications) required by this section recorded in a form suitable and readily available for inspection and review? Have the files been retained for at least five years following the date of each occurrence, measurement, maintenance, corrective action, report, or record? NOTE: at a minimum, the most recent two years of data shall be retained on site.	The facility must improve recordkeeping and reporting activities for PCMACT compliance. Notifications and reports have not been submitted as noted. In addition, monthly Method 22 observations been documented. Corrected 4th quarter 2005.	N	M/A	O	RK	A
40 CFR 63.1355(b)(1)-(3)	Does the facility maintain records for each affected source as required by §63.10(b)(2) and (b)(3) of this part, including all documentation supporting initial notifications and notifications of compliance status under §63.9 of this part; all records of applicability determination, including supporting analyses; and, if the a waiver has been granted under §63.8(f)(6), any information demonstrating whether a source is meeting the requirements for a waiver of recordkeeping or reporting requirements?	The facility must improve recordkeeping and reporting activities for PCMACT compliance. Notifications and reports have not been submitted as noted. In addition, monthly Method 22 observations must be completed and documented. Corrected 4th quarter 2005.	N	M/A	O	RK	A
40 CFR 63.1355(c)	Does the facility maintain all records required for continuous monitoring systems as specified by 63.10(c)?	Thermocouple and COMs records are not complete. These records shall include all measurements; identify the date and time which the CMS was inoperative except for zero (low-level) and high-level checks; out of control periods; excess emissions and parameter monitoring exceedances, etc. Corrected Sept. 2005.	N	M/A	O	RK	A
Subpart A Requirements							
40 CFR 63.1(b)(3) 40 CFR 63.10(b)(3)	For relevant standards or requirements that the source has determined do not apply, does a record exist of the analysis demonstrating why the source is believed to be unaffected? NOTE: this determination of nonapplicability must be kept on site for a period of 5 years after the determination. If relevant, the analysis shall be performed in accordance with requirements established in the PC MACT and, if relevant, should be performed in accordance with EPA guidance materials published to assist sources in making applicability determinations under section 112.	No record currently exists that identifies the PCMACT affected sources and the unaffected sources at the plant. Records have been duplicated and moved to facility 12/2005. Ongoing.	N	M/A	O	RK	A
40 CFR 63.1(c)(1)	Does the source comply with the provisions of 40 CFR 63, Subpart A, and the applicable PC MACT standards?	See individual line item notes.	N	M/A	O	WP	
40 CFR 63.1(c)(2)(iii)	If the facility is an area source, has it applied for a Title V permit in accordance with 40 CFR 70?		NA	A	I	RP	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.1(e)	Has the facility applied for a Title V permit in accordance with 40 CFR 70?	The facility has applied for and been issued a Title V permit.	Y	M	I	RP	A
40 CFR 63.4(a)(1)(i)-(ii)	If the source is operating in violation of 40 CFR 63, Subpart A requirements, is it doing so under an extension of compliance?		NA	M/A	O	WP	A
40 CFR 63.4(a)(2)	Does the source keep records, perform notifications, conduct reporting and revise reports as required by the PC MACT? Rrecordkeeping/reporting system started 12/2005	The facility has not kept records, perform notifications, conduct reporting, and revise reports as required.	N	M/A	O	RP	A
40 CFR 63.4(b)	Has the owner/operator done anything to conceal an emission that would otherwise constitute noncompliance with the PC MACT standards?		Y	M/A	O	WP	A
40 CFR 63.5(b)(3)	After June 14, 1999 was construction of a new major source, or reconstruction of a major source, or reconstruction of a source making it a major source made without obtaining prior written approval from the delegated authority?		Y	M	CCO	RP	A
40 CFR 63.5(b)(4)	After June 14, 1999 was construction of a new affected source, affected source reconstruction, or reconstruction of a source making it an affected source made without notifying the delegated authority? Was the notification submitted in accordance with 40 CFR 63.9(b), and did it include all the information required for an application for approval of construction or reconstruction, as specified in 40 CFR 63.5(d)? Submitting Notice of Compliance 2/2006.	The permit application submitted to DERM for the new plant serves as the facility's initial notification. The facility also submitted notification of the actual date of startup within 15 days of that date, but has not submitted a notice of compliance status.	N	M/A	CCO	RP	A
40 CFR 63.5(d)(1)(i) 40 CFR 63.5(f)(2)	If a new major source was constructed, or a major source was reconstructed, or a major source was reconstructed making it an affected source, was an application for approval of the construction or reconstruction submitted as soon as practicable before the construction or reconstruction? NOTE: the application shall be submitted as soon as practicable before startup, but no later than 60 days after June 14, 1999, if the construction or reconstruction had commenced, and initial startup had not occurred before that date.		Y	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)	If a new major source was constructed, and/or a major source was reconstructed, and/or a major source was reconstructed making it an affected source, were separate applications for approval of each construction and/or reconstruction submitted?		Y	M	CCO	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.5(d)(1)(ii)(A)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain the applicant's name and address?	The facility submitted an application and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)(B)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain a notification of intention to construct a new major source or make any physical or operational change to a major source that meets the criteria for a reconstruction, as defined in 40 CFR 63.2, or in the relevant standard?	The facility submitted an application and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)(C)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain the address or proposed address of the source?	The facility submitted an application and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)(D)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain an identification of the relevant standard that is the basis of the application?	The facility submitted an application and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)(E)-(F)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain the expected commencement and completion dates of the construction or reconstruction?	The facility submitted an application and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(1)(ii)(H)	For construction of a new major source, or reconstruction of a major source, or reconstruction of a major source making it an affected source, did the application for approval contain the type and quantity of HAPs emitted by the source, reported in units and averaging times and in accordance with the test methods specified in the relevant standard, or if actual emissions data were not yet available, an estimate of the type and quantity of HAPs expected to be emitted reported in units and averaging times specified in the relevant standard? NOTE: percent reduction information may be submitted if a relevant standard is established in terms of percent reduction. However operating parameters, such as flow rate, shall be included in the submission to the extent that they demonstrate performance and compliance.	The facility submitted a complete application including HAP emission calculations and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.5(d)(1)(iii) 40 CFR 63.5(d)(2)	For construction of a new major source, reconstruction of a major source, or reconstruction of a major source making it an affected source, was actual measured emissions data and actual control device efficiency data submitted no later than with the Notification of Compliance Status, in the event only estimates or preliminary information (instead of actual data) were initially provided?	The D/F and PM performance test results were submitted to DERM. However, there is no evidence that the facility made notification of compliance status.	NA	M	CCO	RP	A
40 CFR 63.5(d)(2)	For construction of a new major source, does the application for approval include the proposed nature, size, design, operating design capacity, and method of operation of the source, identify each emission point for each HAP emitted, and describe the planned air pollution controls, with control efficiency and supporting calculations?	The facility submitted a complete application including HAP emission calculations and obtained a construction permit for the modernization project.	NA	M	CCO	RP	A
40 CFR 63.5(d)(3)(i)-(ii)	For reconstruction of a major source, does the reconstruction application contain a description of the source and the components to be replaced and a description of present and proposed emission control systems? NOTE: The description of the control method shall include control efficiency (percent) and emission estimate calculations.		NA	M	CCO	RP	A
40 CFR 63.5(d)(3)(iii)-(v)	If there are economic or technical limitations that prevent the source from complying with all relevant standards or other requirements, in the event a major source is reconstructed, then does the application for approval of reconstruction include an estimate of the fixed capital cost of the replacements and of constructing an entirely new source, the estimated life of the source after the replacements, and a discussion of any economic or technical limitations the source may have in complying with relevant standards or other requirements after the proposed replacements? NOTE: The economic feasibility discussion shall demonstrate to the delegated authority's satisfaction that the technical or economic limitations affect the source's ability to comply with the relevant standard.		NA	M	CCO	RP	A
40 CFR 63.5(e)(2)(ii)	For construction of a new major source or reconstruction of a major source, if the facility was notified as having submitted an incomplete application, was the additional information required submitted to the delegated authority within 30 calendar days of notification?		NA	M	CCO	RP	A
40 CFR 63.6(b)(1)	For new or reconstructed sources that have an initial startup *before* June 14, 1999, was compliance achieved with all relevant standards not later than June 14, 1999? Option: 40 CFR 63.6(b)(3) or (b)(4)	The facility became a major source of HAP on June 1, 2004.	NA	M	CCO	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(b)(2)	For new or reconstructed sources that have an initial startup *after* June 14, 1999, was compliance achieved with all relevant standards upon startup? Option: 40 CFR 63.6(b)(3) or (b)(4)	The facility became a major source of HAP on June 1, 2004. Compliance with the D/F and opacity limits were demonstrated by performance tests conducted in Nov. 2004. It is unclear if the Method 9s performed on the other affected sources qualify as initial compliance w/ PC MACT, since the results were submitted to DERM after the deadline.	N	M	CCO	RP	A
40 CFR 63.6(b)(3)(i)-(ii)	If the construction or reconstruction began after March 24, 1998 but before June 14, 1999, AND the promulgated standard is more stringent than the proposed standard, AND the source complies with the proposed standard, then compliance may be achieved not later than June 14, 2002.		NA	M	CCO	WP	A
40 CFR 63.6(b)(5)	For new source construction that began after March 24, 1998 but before June 14, 1999, has the delegated authority been notified in accordance with 40 CFR 63.9(d)?		NA	M	CCO	RP	A
40 CFR 63.6(b)(7)	If an unaffected new area source increased its emissions (actual or potential) such that the source became major and subject to an emission standard, did the source comply with the relevant emission standard immediately upon becoming a major source?		NA	A	I	RP	A
40 CFR 63.6(c)(1)	For existing sources, was compliance with relevant standards established under section 112(d) or 112(h) demonstrated by June 14, 2002?		NA	M/A	I	WP	A
40 CFR 63.6(c)(5)	If an unaffected existing area source increased its emissions (actual or potential) such that the source became major and subject to an emission standard, did the source comply with relevant emission standards within 3 years of the emissions increase? NOTE: if the existing area source became major by the addition of a new source or by reconstructing, the new portion of the existing facility shall comply with the new source standards, including the compliance date for new sources.	The facility became a major source of HAP on June 1, 2004. Compliance with the D/F and opacity limits were demonstrated by performance tests conducted in Nov. 2004. It is unclear if the Method 9s performed on the other affected sources qualify as initial compliance w/ PCMACT, since the results were submitted to DERM after the deadline. The existing FMs will come into compliance by June 1, 2007.	N	A	I	WP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(e)(1)(i)	At all times, including periods of startup, shutdown, and malfunction, was the source operated, to the extent practicable, in a manner consistent with good air pollution control practices for minimizing emissions?		Y	M/A	O	WP	A
40 CFR 63.6(e)(1)(ii)	Were malfunctions corrected as soon as practicable in accordance with the Startup, Shutdown, and Malfunction Plan?		Y	M/A	CSM	WP	A
40 CFR 63.6(e)(3)(i)	Was a written Startup, Shutdown, and Malfunction Plan developed and implemented by June 14, 2002 that describes, in detail, procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction, and a program of corrective action for malfunctioning process and air pollution control equipment as required to comply with the PC MACT? Option: The source's standard operating procedures (SOP) manual, or an OSHA or other plan may be used, provided it meets all the requirements of 63.6(e)(3) [63.6(e)(3)(vi)].	A SSM Plan has not been formally prepared or implemented. SOPs need to be formally incorporated or referenced in the SSM Plan.	N	M/A	O	RP	A
40 CFR 63.6(e)(3)(i)	Is the Startup, Shutdown, and Malfunction Plan incorporated by reference in the source's Title V permit?		Y	M/A	I	RK	A
40 CFR 63.6(e)(3)(i)	Does the Startup, Shutdown, and Malfunction Plan identify all routine or otherwise predictable malfunctions?	A SSM Plan has been prepared 2nd quarter 2006.	N	M/A	I	RK	A
40 CFR 63.6(e)(3)(ii)	During periods of startup, shutdown, and malfunction, was the source operated in accordance with the procedures of the Startup, Shutdown, and Malfunction Plan ?	A SSM Plan has been prepared 2nd quarter 2006.	N	M/A	CSM	WP	A
40 CFR 63.6(e)(3)(iii)	Are records kept demonstrating that procedures specified in the Startup, Shutdown, and Malfunction Plan are followed? Do these records include the occurrence and duration of each startup, shutdown, or malfunction of the air pollution control equipment?	A SSM Plan has been prepared. Records of the occurrence and duration of each SSM need to be formally maintained by a system like PlantGuide.	N Subm t 2/2006.	M/A	CSM	WP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(e)(3)(iv) 40 CFR 63.1354(b)(5)	If actions taken during startup, shutdown, or malfunction were not consistent with the procedures specified in the Startup, Shutdown and Malfunction Plan, were actions taken for that event recorded and reported to the delegated authority within 2 working days after commencing such actions, and followed by a certified letter to the delegated authority within 7 working days after the end of the event?	A SSM Plan has been prepared. Actions taken in response to each SSM need to be documented and reported to DERM as required. Submitting 2nd quarter 2006.	N	M/A	CSM	WP	A
40 CFR 63.6(e)(3)(v)	Is the Startup, Shutdown, and Malfunction Plan available for inspection by the delegated authority? If the plan was revised, was the superseded plan kept and available to the delegated authority for inspection for 5 years after the revision?	A SSM Plan has been prepared and is not currently available for inspection. Submitting 2nd quarter 2006.	N	M/A	O	WP	A
40 CFR 63.6(e)(3)(vii)	If required by the delegated authority or EPA, were changes to the Startup, Shutdown, and Malfunction Plan made accordingly?		NA	M/A	CSM	RP	A
40 CFR 63.6(e)(3)(viii)	If the Startup, Shutdown, and Malfunction Plan failed to address a malfunction event that was not originally included in the plan, was the plan revised within 45 days after the event to address similar malfunction events?	A SSM Plan has been prepared and is not currently available for inspection. Submitting 2nd quarter 2006.	N	M/A	CSM	RP	A
40 CFR 63.6(f)(2)(iii)	Did the source conduct performance testing at startup to obtain a Title V operating permit? If so, such performance testing results may be used to demonstrate compliance with a relevant standard if (A) the performance test was conducted within a reasonable amount of time before an initial performance test is required to be conducted under the relevant standard; (B) the performance test was conducted under representative operating conditions for the source; (C) the performance test was conducted and the resulting data were reduced using EPA-approved test methods and procedures, as specified in 40 CFR 63.7(e); and (D) the performance test was appropriately quality-assured, as specified in 40 CFR 63.7(c).		Y	M/A	PT	RP	A
40 CFR 63.6(g)(2)	For sources requesting an alternate nonopacity emission standard, was the following information submitted? The proposed test plan, or the results of testing and monitoring in accordance with 40 CFR 63.7 and 63.8, a description of the procedures followed in the testing or monitoring, and a description of pertinent conditions during the testing or monitoring. NOTE: any testing or monitoring conducted to request permission to use an alternative nonopacity emission standard must be appropriately quality-assured and quality-controlled.		NA	M	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(h)(2)(i)	For sources *required* to use a COM, is compliance with the opacity emission standards determined from the COM data?	Compliance with the in-line kiln/raw mill opacity standard is determined from the COM data. Reports are generated by the DAHS.	Y	M	O	WP	A
40 CFR 63.6(h)(2)(iii)	Did the source conduct opacity or visible emissions testing at startup to obtain a Title V operating permit? If so, such testing results may be used to demonstrate compliance with a relevant standard if (A) the opacity or visible emission test was conducted within a reasonable amount of time before a performance test was required to be conducted under the relevant standard; (B) the opacity or visible emission test was conducted under representative operating conditions for the source; (C) the opacity or visible emission test was conducted and the resulting data were reduced using EPA-approved test methods and procedures, as specified in 40 CFR 63.7(e); and (D) the opacity or visible emission test was appropriately quality-assured, as specified in 40 CFR 63.7(c).	Testing of new sources for Title V permit purposes may be able to be used for PC MACT compliance purposes per this provision. We could determine if Tarmac has utilized this provision relative to the Method 9 testing completed at the end of 2004.	NA	M	O	RP	A
40 CFR 63.6(h)(4)	Was the delegated authority notified in writing of the anticipated date for conducting opacity or visible emission observations?		Y	M	O	RP	A
40 CFR 63.6(h)(5)(i)	Were opacity or visible emission observations conducted concurrently with the initial performance test? Option: 40 CFR 63.6(h)(5)(i)(B)		Y	M	I	WP	A
40 CFR 63.6(h)(5)(i)(B)	If visibility or other conditions determined by the visible emissions observer prevented the opacity or visible emission observations from being conducted concurrently with the initial performance test, were the opacity or visible emission observations rescheduled as soon after the initial performance test as possible, but not later than 30 days thereafter? Was the delegated authority notified of the rescheduled date? Were the rescheduled opacity or visible emission observations conducted (to the extent possible) under the same operating conditions that existed during the initial performance test?		NA	M	O	RP	A
40 CFR 63.6(h)(6)	Were records, deemed necessary to determine the conditions under which visual observations were made, available upon request by the delegated authority, including evidence indicating proof of current visible observer emission certification?		NA	M/A	O	RK	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(i)(1)	If a compliance extension was requested, did the source comply with all applicable requirements of the PC MACT until the compliance extension had been granted?		NA	M/A	CEX	WP	A
40 CFR 63.6(i)(4)(i)(A)	Has a compliance extension been requested? If so, did the source apply to have it's Title V permit revised to incorporate the conditions of the compliance extension?		NA	M/A	CEX	RP	A
40 CFR 63.6(i)(4)(i)(B)	Has a compliance extension been requested, and is the source *including* emission points in an emissions average? If so, did the source submit a request in writing for a compliance extension not later than 120 days before June 14, 2002?		NA	M/A	CEX	RP	A
40 CFR 63.6(i)(4)(i)(B)	Has a compliance extension been requested, and is the source *not including* emission points in an emissions average? If so, did the source submit a request in writing for a compliance extension not later than 120 days before June 14, 2002?		NA	M/A	CEX	RP	A
40 CFR 63.6(i)(5)	Has a five-year compliance extension been requested, in accordance with 40 CFR 63.6(i)(5)? If so, was the compliance extension request submitted in writing not later than 120 days after June 14, 1999?		NA	M/A	CEX	RP	A
40 CFR 63.6(i)(6)(i)(A)	Has a compliance extension been requested? If so, did the request for a compliance extension include a description of the controls to be installed to comply with the standard?		NA	M/A	CEX	RP	A
40 CFR 63.6(i)(6)(i)(B)(1)-(4)	Has a compliance extension been requested? If so, did the request for a compliance extension include a compliance schedule, including the date by which each step toward compliance will be reached? NOTE: at a minimum, the list of dates shall include: (1) the date by which contracts for emission control systems or process changes for emission control will be awarded, or the date by which orders will be issued for the purchase of component parts to accomplish emission control or process changes; (2) the date by which on-site construction, installation of emission control equipment, or a process change is to be initiated; (3) the date by which on-site construction, installation of emission control equipment, or a process change is to be completed; and (4) the date by which final compliance is to be achieved.		NA	M/A	CEX	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.6(i)(6)(ii)	Has a five-year compliance extension been requested in accordance with 40 CFR 63.6(i)(5)? If so, did the request for a compliance extension include all information needed to demonstrate to the Administrator's satisfaction that the installation of BACT or technology to meet LAER controls the same pollutant (or stream of pollutants) that would be controlled at that source by the relevant emission standard?		NA	M/A	CEX	RP	A
40 CFR 63.7(b)(1)	Was the delegated authority or EPA notified in writing of the intention to conduct a performance test at least 60 days before the performance test was scheduled to begin?		Y	M/A	PT	MO	A
40 CFR 63.7(b)(2)	In the event a performance test was not conducted on the date specified, was the delegated authority or EPA notified as soon as practicable and without delay prior to the scheduled test date, and was notification given of the rescheduled test date?		NA	M/A	PT	MO	A
40 CFR 63.7(c)(2)(i)	Was a test plan developed before conducting a required performance test? Was the test plan submitted to the delegated authority or EPA, if it was requested? NOTE: the test plan shall include a test program summary, the test schedule, data quality objectives, and both an internal and external quality assurance (QA) program.		Y	M/A	PT	MO	A
40 CFR 63.7(c)(2)(ii)	Does the internal QA program include the activities planned by routine operators and analysts to provide an assessment of test data precision?	No CMS plan currently exists. Therefore no procedure for this exists. This requirement should be included in that plan. Being developed.	N	M/A	PT	MO	A
40 CFR 63.7(c)(2)(iii)	Does the external QA program include application of plans for a test method performance audit (PA) during the performance test? NOTE: the PAs consist of blind audit samples provided by the delegated authority and analyzed during the performance test in order to provide a measure of test data bias. The external QA program may also include systems audits that include the opportunity for on-site evaluation by the delegated authority of instrument calibration, data validation, sample logging, and documentation of quality control data and field maintenance activities.	No CMS plan currently exists. Therefore no procedure for this exists. This requirement should be included in that plan. Being developed.	N	M/A	PT	MO	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.7(c)(2)(iv)	If requested, was the test plan submitted to the delegated authority at least 60 calendar days before the performance test was scheduled, or on a mutually agreed upon date?		NA	M/A	PT	MO	A
40 CFR 63.7(c)(3)(ii)(A)	Has the delegated authority failed to approve or disapprove a site-specific test plan within the time period specified in 40 CFR 63.7(c)(3)(i)? If so, and if the owner or operator intends to demonstrate compliance using the test method(s) specified in the relevant standard, the performance test must be conducted within the time specified in 40 CFR 63.7(c), using the specified method(s).		NA	M/A	PT	MO	A
40 CFR 63.7(c)(3)(ii)(B)	Has the delegated authority failed to approve or disapprove a site-specific test plan within the time period specified in 40 CFR 63.7(c)(3)(i)? If so, and if the owner or operator intends to demonstrate compliance by using an alternative to any test method specified in the relevant standard, has the owner or operator refrained from conducting the performance test until the Administrator approves the use of the alternative method? NOTE: the owner is authorized to conduct the performance test using an alternative method in the absence of notification of approval 45 days after submission of the site-specific test plan or request to use an alternative method. The owner or operator shall conduct the performance test within 60 calendar days after the Administrator approves the site-specific test plan or after use of the alternative method is approved.		NA	M/A	PT	MO	A
40 CFR 63.7(c)(4)(i)	Have performance audit samples been analyzed during each performance test and were the performance audit samples requested 30 days prior to the test date?	The performance evaluation of the COMs was not available to be reviewed. As such, it cannot be determined if performance audit samples were analyzed.	N	M/A	PT	MO	A
40 CFR 63.7(d)	Have adequate sampling ports, safe access to sampling platforms, utilities for sampling and testing equipment, and any other facilities deemed necessary by the delegated authority and EPA been provided?		Y	M/A	PT	MO	A
40 CFR 63.7(e)(1)	Have performance tests been conducted under conditions specified by the delegated authority and based on normal operating conditions of the source? If requested, were records necessary to determine performance test conditions made available to the delegated authority?		Y	M/A	PT	MO	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.7(e)(2)	Have performance tests been conducted and data reduced in accordance with the test methods and procedures set forth in 40 CFR 63.7 and 40 CFR 63.1349?		Y	M/A	PT	MO	A
40 CFR 63.7(e)(3)	Has each performance test consisted of three separate runs of the applicable test method? Was each run conducted for the time and under the conditions specified in 40 CFR 63.1349?	Three separate D/F and PM test runs were conducted for the mill on scenario. Only two test runs were conducted during the mill off scenario. No documentation supporting approval of this alternative performance test method was identified. Retested 2005.	N	M/A	PT	MO	A
40 CFR 63.7(e)(3)(i)-(iv)	Was a test run replaced with the results of an additional test run? If so, was the sample accidentally lost, or did conditions occur in which one of the three runs had to be discontinued because of forced shutdown, or did extreme meteorological conditions occur, or did other circumstances occur that were beyond the operator's control?		NA	M/A	PT	MO	A
40 CFR 63.7(f)(2)(i)	Was an alternative test method used? If so, was the delegated authority notified of the intention to use an alternative test method at least 60 days before the performance test was scheduled to begin?		NA	M/A	PT	RP	A
40 CFR 63.7(f)(2)(ii)	Was an alternative test method used? If so, was Method 301 used to validate the alternate method?		NA	M/A	PT	WP	A
40 CFR 63.7(f)(2)(iii)	Was an alternative test method used? If so, were the results of the Method 301 validation submitted along with the notification of intention and the justification for not using the specified test method?		NA	M/A	PT	RP	A
40 CFR 63.7(f)(5)	Was an alternative test method used? If so, has the alternative test method been used for subsequent performance tests, unless approval to use another test method is allowed?		NA	M/A	PT	WP	A
40 CFR 63.7(g)(1)	Do the results of the performance test include the analysis of samples, determination of emissions, and raw data?		Y	M/A	PT	WP	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.7(g)(1)	Have the performance test results been submitted to the delegated authority before the close of business on the 60th day following the completion of the performance test, unless as approved otherwise in writing by the delegated authority? NOTE: the results of the performance test shall be submitted as part of the Notification of Compliance Status required under 40 CFR 63.9(h). Before a Title V permit has been issued to the owner or operator of a source, the owner or operator shall send the results of the performance test to the delegated authority. After a Title V permit has been issued to the owner or operator of a source, the owner or operator shall send the results of the performance test to the delegated authority.		Y	M/A	PT	RP	A
40 CFR 63.7(g)(3)	Are the performance test results retained and made available, upon request, for a minimum of 5 years after the performance test was conducted?		Y	M/A	PT	RK	A
40 CFR 63.7(h)(3)(i)	Has a request to waive a performance test been made? If so, did the application for a waiver of an initial test accompany the request for an extension of compliance? If no extension of compliance was requested, or if an extension is still under consideration, was the application for a test waiver submitted at least 60 days before the test, if the site-specific test plan was not submitted?		NA	M/A	PT	RP	A
40 CFR 63.7(h)(3)(ii)	Has a request to waive a performance test been made? If so, if an application for a waiver of subsequent performance tests was made, was the application submitted at least 60 days before the test, if the site-specific test plan was not submitted?		NA	M/A	PT	RP	A
40 CFR 63.7(h)(3)(iii)	Has a request to waive a performance test been made? If so, did it include information justifying the request for a waiver, such as the technical or economic infeasibility, or the impracticality, of the source performing the required test?		NA	M/A	PT	RP	A
40 CFR 63.8(b)(1)	Have all PC MACT continuous monitoring systems been operated in a manner consistent with the PC MACT standards and the applicable monitoring requirements in 40 CFR 63 Subpart A? Start Quarterly Calibration 4th Q 2005.	The quarterly calibration of the thermocouple has not been adequately documented. There is no evidence that the initial performance evaluation on the COMs was completed.	N	M/A	O	MO	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(b)(2)(i)	Are the effluents from a single source, or from two or more sources combined before being released to atmosphere? If so, is a CMS, as applicable, installed on each effluent?		Y	M/A	O	MO	A
40 CFR 63.8(b)(2)(ii)	If the relevant standard is a mass emission standard, and the effluent from a source is released to atmosphere through more than one point, is a CMS, as applicable, installed on each emission point? Option: 40 CFR 63.8(b)(ii)(A) or (B)		NA	M/A	O	MO	A
40 CFR 63.8(b)(2)(ii)(A)-(B)	If the relevant standard is a mass emission standard, and if the effluent from a source is released to atmosphere through more than one point, are continuous monitoring systems installed: (A) as approved by the delegated authority, or (B) as provided for in the relevant standard? Option: 40 CFR 63.8(b)(ii)		NA	M/A	O	MO	A
40 CFR 63.8(b)(3)	Is more than one CMS used to measure the emissions from one source? If so, are the results for each CMS reported? NOTE: when one CMS is used as a backup to another CMS, the backup results do not need to be reported.		NA	M/A	O	MO	A
40 CFR 63.8(c)(1)	Are all continuous monitoring systems maintained and operated in a manner consistent with good air pollution control practices?	Without a written CMS Plan, it cannot be determined that this requirement has been completed satisfactorily.	N	M/A	O	MO	A
40 CFR 63.8(c)(1)(i)	Have all continuous monitoring system (CMS) parts been maintained and operated as specified in 40 CFR 63.6(e)(1)?		Y	M/A	CSM	WP	A
40 CFR 63.8(c)(1)(ii)	Are the necessary parts for routine repairs of the affected CMS equipment readily available?		Y	M/A	O	RP	A
40 CFR 63.8(c)(1)(ii)	Was a report sent within 2 weeks after commencing action(s) that are not consistent with the Startup, Shutdown, and Malfunction Plan that either certifies that corrections have been made, or that includes a corrective action plan and schedule, for those malfunctions or other events that affect the CMS and are not addressed by the Startup, Shutdown, and Malfunction Plan? Was proof that repair parts have been ordered or any other records that would indicate that the delay in making repairs is beyond the owner's or operator's control provided?	Corrective actions and work orders are tracked using PlantGuide. Repair delays should be documented using this system. No reports have been submitted, since the SSM plan has not been prepared.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(c)(2)	Have all CMS been installed such that representative measurement of emissions or process parameters are obtained from the source?		Y	M/A	I	MO	A
40 CFR 63.8(c)(3)	Have all required CMS been installed, operational, and the data verified as specified in the PC MACT, either prior to, or in conjunction with, conducting the initial performance test?		Y	M/A	O	MO	A
40 CFR 63.8(c)(4)	Have all CMS, including COMS and CEMS been in continuous operation, and have such systems met minimum frequency of operation requirements as follows: (i) a minimum of one cycle of sampling and analyzing for each successive 10-second period and one cycle of data recording for each successive 6-minute period for all COMS; and (ii) a minimum of one cycle of operation (sampling, analyzing, and data recording) for each successive 15-minute period for all CEMS measuring emissions other than opacity.		Y	M/A	O	MO	A
40 CFR 63.8(c)(5)	Do all COMs include a method for producing a simulated zero opacity condition and an upscale (high-level) opacity condition using a certified neutral density filter or other related technique to produce a known obscuration of the light beam? NOTE: such procedures shall provide a system check of all the analyzer's internal optical surfaces and all electronic circuitry, including the lamp and photodetector assembly normally used in the measurement of opacity.		Y	M/A	O	MO	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(c)(6)	For all CMS, that is not a CPMS, installed in accordance with the PC MACT, are the zero (low-level) and high-level calibration drifts checked at least once daily in accordance with the written procedure specified in the performance evaluation plan? NOTE: the zero (low-level) and high-level calibration drifts shall be adjusted, at a minimum, whenever the 24-hour zero (low-level) drift exceeds two times the limits of the applicable performance specification(s) specified in the relevant standard. The system must allow the amount of excess zero (low-level) and high-level drift measured at the 24-hour interval checks to be recorded and quantified, whenever specified. For COMS, all optical and instrumental surfaces exposed to the effluent gases shall be cleaned prior to performing the zero (low-level) and high-level drift adjustments; the optical surfaces and instrumental surfaces shall be cleaned when the cumulative automatic zero compensation, if applicable, exceeds 4 percent opacity.	The performance evaluation plan was not available to be reviewed. However, zero opacity and span checks on the COMs are performed every 4 hours automatically.	N	M/A	O	MO	A
40 CFR 63.8(c)(6)	If a CPMS is used for compliance, was it calibrated prior to use and is it checked daily for indication that the system is responding? If the CPMS system includes an internal system check, are results recorded and checked daily for proper operation?		NA	M/A	O	MO	A
40 CFR 63.8(c)(7)	If a CMS was out-of-control, was the necessary corrective action taken and were all necessary tests which indicate that the system is out of control repeated? Was corrective action taken and retesting conducted until the performance requirements were below the applicable limits? NOTE: a CMS is out of control if (A) the zero (low-level), mid-level (if applicable), or high-level calibration drift (CD) exceeds two times the applicable CD specification in the applicable performance specification or relevant standard; or (B) the CMS fails a performance test, relative accuracy, relative accuracy test, or linearity test audit; or (C) the COMS CD exceeds two times the limit in the applicable performance specification in the relevant standard. NOTE: The start of the out-of-control period is the hour the owner or operator conducts a performance check indicating an exceedance of the performance requirements and the end is the hour following the completion of corrective action and successful demonstration that the system is within the allowable limits.	Currently, out of control periods on the temperature system are not monitored routinely by the facility. Corrected 1st Q 2006.	N	M/A	CSM	MO	A
40 CFR 63.8(c)(8)	If a CMS was out-of-control, was all information concerning out-of-control periods, including start and end dates, and hours and descriptions of corrective actions taken, submitted in the excess emissions and continuous monitoring system performance report?	Currently, out of control periods on the temperature system are not monitored routinely by the facility. Reprogramming a new DAHS.	N	M/A	CSM	RP	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(d)(2)	Has a CMS quality control program been developed and implemented? Developing 2nd Q 2006.	A QA/QC plan for the COMs has not been developed or implemented.	N	M/A	O	MO	A
40 CFR 63.8(d)(2)	If requested by the delegated authority, has a site-specific performance evaluation test plan for the CMS performance evaluation been submitted for approval?		NA	M/A	O	MO	A
40 CFR 63.8(d)(2)(i)-(vi)	Does the CMS quality control program include a written protocol that describes procedures for: (i) initial and any subsequent calibration of the CMS; (ii) determination and adjustment of the calibration drift; (iii) preventive maintenance, including spare parts inventory; (iv) data recording, calculations, and reporting; (v) accuracy audit procedures, including sampling and analysis methods; and (vi) program of corrective action for a malfunctioning CMS?	A QA/QC plan for the COMs has not been developed or implemented.	N	M/A	O	MO	A
40 CFR 63.8(d)(3)	Are the CMS quality control program written procedures kept on record and are they available for inspection by the delegated authority?	A QA/QC plan for the COMs has not been developed or implemented. Developing 2nd Q 2006.	N	M/A	O	RK	A
40 CFR 63.8(d)(3)	If the CMS performance evaluation plan is revised, are previous (i.e., superseded) versions of the plan kept on record and available for inspection, *upon request*, for a period of 5 years after each revision to the plan? NOTE: where relevant, (e.g., program of corrective action for a malfunctioning CMS), these written procedures may be incorporated as part of the Startup, Shutdown, and Malfunction Plan to avoid duplication of efforts.	A CMS performance evaluation or SSM plans have not been prepared.	NA	M/A	O	RK	A
40 CFR 63.8(e)(1)	Has a CMS performance evaluation been conducted according to the applicable specifications and procedures described in 40 CFR 63.8 and the PC MACT?	There is no evidence that a COMs performance evaluation was conducted. Conducted Quarterly Calibration/3rd Q 06.	N	M/A	O	MO	A
40 CFR 63.8(e)(2)	In the event a CMS performance evaluation was required, was the delegated authority notified, in writing, of the date of the CMS performance evaluation, simultaneously with the notification of the performance test date, or at least 60 days prior to the date the performance evaluation was scheduled to begin, if no performance test was required?	There is no evidence that DERM was notified in writing of the date of the COMs performance evaluation or that DERM was notified of the performance test date. The facility may want to contact their contractor to see if the notices were sent from their end.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(e)(3)(i)	*If requested*, has a CMS performance evaluation test plan been submitted to the delegated authority for approval? If so, did the performance evaluation test plan include the evaluation program objectives, an evaluation program summary, the evaluation schedule, data quality objectives, and both an internal and external QA program?		NA	M/A	O	RP	A
40 CFR 63.8(e)(3)(ii)	*If requested*, did the CMS performance evaluation test plan submitted to the delegated authority contain an internal QA program that includes the activities planned by routine operators and analysts to provide an assessment of CMS performance, and an external QA program that provides for systems audits that include the opportunity for on-site evaluation by the delegated authority of instrument calibration, data validation, sample logging, and documentation of quality control data and field maintenance activities?		NA	M/A	O	WP	A
40 CFR 63.8(e)(3)(iii)	*If requested*, was the CMS performance evaluation test plan submitted to the delegated authority at least 60 days before the performance test or performance evaluation was scheduled to begin, or on a mutually agreed upon date?		NA	M/A	O	RP	A
40 CFR 63.8(e)(3)(v)(A)	If the source intends to demonstrate compliance using monitoring methods specified in the PC MACT, and the CMS site-specific performance evaluation test plan was not approved within the expected time period, did the performance evaluation proceed, in accordance with the applicable requirements?	There is no evidence that a COMs performance evaluation was conducted.	N	M/A	O	WP	A
40 CFR 63.8(e)(3)(v)(B)	If the source intends to demonstrate compliance using an alternative monitoring method, and the alternative monitoring method was not approved within 30 days before the performance evaluation was scheduled to begin, was the performance evaluation conducted within 60 days after the approval to use the alternative method was actually made?		NA	M/A	CAL	PT	A
40 CFR 63.8(e)(4)	Was a CMS performance evaluation conducted whenever a performance test occurred?	There is no evidence that a COMs performance evaluation was conducted.	N	M/A	O	WP	A
40 CFR 63.8(e)(4)	Has the requirement for a performance test been waived, or is not applicable? If so, was a performance evaluation conducted not later than 180 days after June 14, 2002?		NA	M/A	I	WP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(e)(4) and 40 CFR 63.8(e)(5)(ii)	If COMS data is used for compliance with an opacity emission standard, was a COMS performance evaluation conducted before the performance test and were two copies (or three if requested) of the performance evaluation report submitted at least 15 calendar days before the performance test?	There is no evidence that a COMs performance evaluation was conducted.	N	M/A	O	RP	A
40 CFR 63.8(e)(5)	Was a copy of the performance evaluation report submitted with the results of the performance test, or within 60 days of completion of the performance evaluation if no test is required?	There is no evidence that a COMs performance evaluation was conducted. Therefore, a performance evaluation report was not submitted with the performance test results.	N	M/A	O	RP	A
40 CFR 63.8(f)(1)	If an alternative monitoring method is requested, has the source complied with all otherwise applicable requirements of the PC MACT, until permission to use the alternative method has been granted by the delegated authority?		NA	M/A	CAL	WP	A
40 CFR 63.8(f)(3)	Is there reasonable grounds to dispute the results obtained by an alternative monitoring method, requirement, or procedure? If so, the delegated authority may require the use of a method, requirement, or procedure specified in 40 CFR 63.8(f) or the PC MACT standard.		NA	M/A	CAL	MO	A
40 CFR 63.8(f)(4)(i)	If use of an alternative monitoring method is desired, has an application for its use been submitted to the delegated authority? If the alternative method is to be used to demonstrate compliance, was the application submitted at least 60 days before the performance evaluation was scheduled to begin and must meet the requirements for an alternative test method under 40 CFR 63.7(f)?		NA	M/A	CAL	RP	A
40 CFR 63.8(f)(4)(ii)	If use of an alternative monitoring method is desired, does the application for its use contain a description of the proposed alternative monitoring system and performance evaluation test plan, if required? In addition, does the application include information justifying the request, such as the technical or economic infeasibility, or the impracticality, of the source using the required method?		NA	M/A	CAL	RK	A
40 CFR 63.8(f)(iii)	If use of an alternative monitoring method was approved, has the source continued to use that method until receiving approval to use another method (as applicable)?		NA	M/A	CAL	WP	A
40 CFR 63.8(g)(2)	Is a COMS used? If so, is the data reduced to six-minute averages calculated from 36 or more data points equally spaced over each six-minute period?	A COMS is used and the data is reduced to 6 minute averages as required.	Y	M/A	O	WP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.8(g)(4)	Has all emission data been converted into units of the relevant standard using the conversion procedures specified in that standard?		NA	M/A	O	WP	A
40 CFR 63.8(g)(5)	Do all data averages computed omit any monitoring data recorded during periods of CMS break-downs, out-of-control periods, repairs, maintenance periods, calibration checks and zero (low-level) and high-level adjustments? If complying with the requirements of 40 CFR 63.10(b)(2)(vii)(A) or (B) did data averages include any data recorded during periods of monitor breakdown or malfunction?	The facility plans to work with the DAHS vendor to ensure all data averages are properly computed. Replacement of DAHS scheduled 3/2005.	N	M/A	O	WP	A
40 CFR 63.9(a)(4)(ii) and 40 CFR 63.10(a)(4)(ii)	Has a copy of each notification sent to the delegated authority also been sent to the EPA?	No evidence exists that the required notices and reports were submitted to both DERM and EPA.	N	M/A	O	RP	A
40 CFR 63.9(b)(2)	Did the source have an initial startup before June 14, 1999? If so, has the EPA been notified in writing not later than October 12, 1999 (120 calendar days after the effective date of the relevant standard) that the source is subject to a PC MACT standard?		Y	M/A	I	RP	A
40 CFR 63.9(b)(2)(i)	If the source provided an initial notification to EPA of PC MACT applicability, did the notification contain the name and address of the owner or operator?		Y	M/A	I	RP	A
40 CFR 63.9(b)(2)(ii)	If the source provided an initial notification to EPA of PC MACT applicability, did the notification contain the address (i.e., physical location) of the affected source?		Y	M/A	I	RP	A
40 CFR 63.9(b)(2)(iii)	If the source provided an initial notification to EPA of PC MACT applicability, did the notification contain an identification of the relevant standard, or other requirement, that is the basis of the notification and the source's compliance date?		Y	M/A	I	RP	A
40 CFR 63.9(b)(2)(iv)	If the source provided an initial notification to EPA of PC MACT applicability, did the notification contain a brief description of the nature, size, design, and method of operation of the source, and an identification of the types of emission points within the affected source subject to the relevant standards and types of HAPs emitted?		Y	M/A	I	RP	A
40 CFR 63.9(b)(2)(v)	If the source provided an initial notification to EPA of PC MACT applicability, did the notification contain a statement of whether the affected source is a major source or an area source?		Y	M/A	I	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.9(b)(4)(i)	Did the owner/operator of a new or reconstructed major source that had an initial startup after June 14, 1999, and for which an application for approval of construction or reconstruction *was required*, provide a notification of the intention to construct or reconstruct along with the application for approval?		Y	M/A	CCO	RP	A
40 CFR 63.9(b)(4)(iv)	Did the owner/operator of a new or reconstructed major source that had an initial startup after June 14, 1999, and for which an application for approval of construction or reconstruction *was required*, provide a notification of the anticipated date of startup, delivered not more than 60 days, or less than 30 days, before such date?		Y	M/A	CCO	RP	A
40 CFR 63.9(b)(4)(v)	Did the owner/operator of a new or reconstructed major source that had an initial startup after June 14, 1999, and for which an application for approval of construction or reconstruction *was required*, provide a notification of the actual date of startup, delivered within 15 calendar days after that date?		Y	M/A	CCO	RP	A
40 CFR 63.9(b)(5)	After June 14, 1999 did the owner/operator who intended to construct a new source, or reconstruct a source, submit a notification to the Administrator? Was a notification of the actual date of startup of the source delivered or postmarked within 15 calendar days after that date? Did the notification include the information required on the application for approval of construction or reconstruction as specified in 40 CFR 63.5(d)(1)(i)?	The permit application submitted to DERM for the new plant serves as the facility's initial notification. The facility also submitted notification of the anticipated date of startup within 30 days of that date and notification of the actual date of startup within 15 days of that date, but has not submitted a notice of compliance status. A notification of initial startup for PK5 was provided within 15 days its startup on June 1, 2004.	N	M/A	CCO	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.9(c)	If the affected source cannot comply with a relevant standard by the applicable compliance date, OR, if BACT or technology to meet LAER consistent with 40 CFR 63.6(i)(5) is installed, has the source requested an extension of compliance as specified in 40 CFR 63.6(i)(4)-(i)(6)?		NA	M/A	O	RP	A
40 CFR 63.9(d)	Was the delegated authority notified of any special compliance requirements for a new source?		NA	M/A	CCO	RP	A
40 CFR 63.9(e)	Has notification of the intention to conduct a performance test been submitted at least 60 days before the performance test was scheduled to begin?	There is no evidence that performance test notification made at least 60 days before performance test was scheduled to begin.	N	M/A	PT	RP	A
40 CFR 63.9(f)	If opacity or visible emission observations are required, was notification of the anticipated date of such observations submitted with the notification of the performance test date? If no performance test is required, or visibility or other conditions prevented the opacity or visible emission observations from being conducted concurrently with the initial performance test, was the notification of the opacity or visible emission observations made not less than 30 days before such observations were scheduled to occur?		Y	M/A	O	RP	A
40 CFR 63.9(g)(1)	Does the source have a CMS? If so, was notification of the date the CMS performance evaluation was scheduled to begin submitted with the performance test notification? If no performance test was required, or if the performance test requirement was waived, was notification of the date of the performance evaluation made at least 60 days before the evaluation was scheduled to begin?	There is no evidence that DERM was notified in writing of the date of the COMs performance evaluation or that DERM was notified of the performance test date.	N	M/A	O	RP	A
40 CFR 63.9(g)(2)	Is COMS data used to determine compliance with an opacity standard? If so, was notification that the COMS data is intended for use in determining compliance submitted at least 60 days before the performance test was scheduled to begin?	The COMs data was used to determine compliance with the 10% opacity standard. There is no evidence that DERM or EPA was notified that the COMs data was to be used 60 days before the performance test.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.9(h)(2)(i) and 40 CFR 63.9(h)(ii)	Before issuance of a Title V permit, and each time a Notification of Compliance Status was required, was Notification of Compliance Status, signed by a responsible official, submitted? Was the notification submitted before the close of business on the 60th day following completion of the relevant compliance demonstration? If no performance test was required, but opacity or visible emission observations were required to demonstrate compliance, was notification of compliance submitted before the close of business on the 30th day following the completion of opacity or visible emission observations?	There is no evidence that the facility made notification of compliance status.	Y Y	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(A)	Did the Notification of Compliance Status include the methods that were used to determine compliance?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(B)	Did the Notification of Compliance Status include the results of any performance tests, opacity or visible emission observations, continuous monitoring system (CMS) performance evaluations, and/or other monitoring procedures or methods that were conducted?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(C)	Did the Notification of Compliance Status include the methods that will be used for determining continuing compliance, including a description of monitoring and reporting requirements and test methods?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(D)	Did the Notification of Compliance Status include the type and quantity of hazardous air pollutants emitted by the source (or surrogate pollutants if specified in the relevant standard), reported in units and averaging times and in accordance with the test methods specified in the relevant standard?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(E)	If relevant standard applies to both major and area sources, did the Notification of Compliance Status include an analysis demonstrating whether the affected source is a major source (using the emissions data generated for this notification)?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(2)(i)(F)	Did the Notification of Compliance Status include a description of the air pollution control equipment (or method) for each emission point, including each control device (or method) for each hazardous air pollutant and the control efficiency (percent) for each control device (or method)?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.9(h)(2)(i)(G)	Did the Notification of Compliance Status include a statement by the owner or operator of the affected existing, new, or reconstructed source as to whether the source has complied with the relevant standard or other requirements?	There is no evidence that the facility made notification of compliance status.	N	M/A	O	RP	A
40 CFR 63.9(h)(3)	Has a Title V permit been issued to the source? If so, has the source complied with all requirements for compliance status reports contained in its Title V permit, including reports required under 40 CFR 63 Subpart A?	A Title V permit has been issued to the facility. However, semi-annual summary reports have not been submitted to DERM or EPA.	N	M/A	O	WP	A
40 CFR 63.9(h)(5)	Has the source submitted estimates or preliminary information in the application for approval of construction or reconstruction in place of actual emissions data or control efficiencies? If so, has the actual emissions data or control efficiency data been submitted as soon as it was available, but no later than with the initial Notification of Compliance Status?		NA	M/A	CCO	RP	A
40 CFR 63.9(i)(2)	Has the source requested a change in a time period or postmark deadline? If so, has the request for the adjustment been submitted as soon as practicable before the subject activity was to take place?		NA	M/A	O	RP	A
40 CFR 63.9(j)	Has there been a change in any information already submitted under the notification requirements of 40 CFR 63.9? If so, was the change in information submitted within 15 days after the change?		NA	M/A	O	RP	A
40 CFR 63.10(a)(4)(i)	If the State *has not* been delegated authority to implement and enforce recordkeeping and reporting requirements under the PC MACT, have the required reports been submitted to the EPA?		NA	M/A	O	RP	A
40 CFR 63.10(a)(4)(ii)	If the State *has* been delegated authority to implement and enforce recordkeeping and reporting requirements under the PC MACT, have the required reports been submitted to both the State and the EPA?	No evidence exists that the required reports have been submitted to both DERM and EPA.	N	M/A	O	RP	A
40 CFR 63.10(a)(5)	Does the State have an established timeline for the submission of periodic reports that is consistent with the reporting frequencies specified in the PC MACT? If so, does the source comply with this established timeline, or with the dates specified in the PC MACT? NOTE: the allowance to submit reports on the State's timeline applies beginning June 14, 2003.		NA	M/A	O	WP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(a)(6)	Does the owner or operator supervise one or more sources subject to a standard established pursuant to section 112? If so, has the owner/operator arranged with the delegated authority a common schedule on which periodic reports required for each source will be submitted? NOTE: this allowance applies beginning one year after the latest compliance date for any relevant standard established pursuant to section 112.		NA	M/A	O	WP	A
40 CFR 63.10(a)(7)	Does the owner or operator supervise one or more sources subject to a standard established pursuant to section 112 of the Act, as amended, and standards set under either part 60 or part 61? If so, has the owner/operator arranged with the delegated authority a common schedule on which periodic reports required for each source will be submitted? NOTE: this allowance applies beginning one year after the latest compliance date for any relevant standard established pursuant to section 112, part 60 or part 61.		NA	M/A	O	WP	A
40 CFR 63.10(b)(1)	Are records kept readily available for inspection? Are records of required information kept for five years, with the most recent 2 years of data retained on site? Records are now kept at facility.	The facility must improve recordkeeping and reporting activities for PC MACT compliance. Records must be kept for 5 years. Note, Title V requirements may be more restrictive.	N	M/A	O	RK	A
40 CFR 63.10(b)(2)(i)	Were records of the occurrence and duration of each startup, shutdown, and malfunction operation maintained? Started Jan. 2006.	Records of the occurrence and duration of each SSM are not being maintained. Although the facility's PlantGuide system can maintain much of this data.	N	M/A	CSM	RK	A
40 CFR 63.10(b)(2)(ii)	Were records of the occurrence and duration of each malfunction of air pollution control and monitoring equipment maintained? Started Jan. 2006.	Records of the occurrence and duration of each malfunction of the APCD have not been maintained. The plant's Datastream system can be improved to fulfill this requirement.	N	M/A	CSM	RK	A
40 CFR 63.10(b)(2)(iii)	Are records of all maintenance performed on air pollution control and monitoring equipment maintained? Started Jan. 2006.	Maintenance records and work orders are maintained using DataStream. However, improved documentation is suggested for compliance with MACT requirements.	Y	M/A	O	RK	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(b)(2)(iv)	Were records of the actions taken during periods of startup, shutdown, and malfunction (including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation) when such actions are different from the procedures in the Startup, Shutdown, and Malfunction Plan maintained?	A SSM Plan has not been prepared. Records of the actions taken during each SSM event shall be recorded. Started 1st Q 2006.	N	M/A	CSM	RK	A
40 CFR 63.10(b)(2)(ix)	Do records exist of all measurements as may be necessary to determine the conditions of performance tests and performance evaluations?		Y	M/A	PT	RK	A
40 CFR 63.10(b)(2)(v)	Were records of all information necessary to demonstrate conformance with the Startup, Shutdown, and Malfunction Plan maintained when such actions were consistent with the procedures in the Startup, Shutdown, and Malfunction Plan?	A SSM Plan has not been prepared. Records of the actions taken during each SSM event shall be recorded. Started 1st quarter 2006.	N	M/A	CSM	RK	A
40 CFR 63.10(b)(2)(vi)	If the source has a CMS, and it malfunctioned or was inoperative, was a record made of each period during which it malfunctioned, or was inoperative (including all out-of-control periods)? Recordkeeping started 3rd Q 2006.	Records have not been adequately maintained of each period during which the COMs or thermocouple malfunctioned or was inoperative.	N	M/A	CSM	RK	A
40 CFR 63.10(b)(2)(vii)	Do records exist of all required measurements needed to demonstrate compliance with a relevant standard (including, but not limited to, 15-minute averages of CMS data, as applicable, raw performance testing measurements, and raw performance evaluation measurements that support data that the source is required to report)?	The DAHS needs to be verified or reprogrammed to ensure the data are averaged correctly. Reports also need to be streamlined for easy identification of exceedances, etc. Replacing DAHS 1st Q 2006.	N	M/A	O	RK	A
40 CFR 63.10(b)(2)(viii)	Do records exist of all results of performance tests, CMS performance evaluations, as applicable, and opacity and visible emission observations?	PM and D/F tests have been completed and opacity during those tests recorded. Initial Method 9 VEOs have been conducted, but monthly 1-minute Method 22s have not been completed for June to Dec. 2005.	N	M/A	O	RK	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(b)(2)(x)	If the source has a CMS, do records exist of all CMS calibration checks? Started Quarterly Maintenance 3rd Q 2005.	Calibrations have not been consistently performed and calibration records are incomplete. The thermocouple needs to be calibrated quarterly, and a regular RATA performed on the COMs.	N	M/A	O	RK	A
40 CFR 63.10(b)(2)(xi)	If the source has a CMS, do records exist of all adjustments and maintenance performed on the CMS? Started 3rd quarter 2005.	No formal documentation of maintenance or adjustments to thermocouple monitoring system were identified.	N	M/A	O	RK	A
40 CFR 63.10(b)(2)(xii)	Has the source has been granted a waiver of recordkeeping and reporting (as specified in 40 CFR 63.10[f])? If so, do records exist demonstrating that the source is meeting the requirements for a waiver of recordkeeping or reporting requirements?		NA	M/A	CO	RK	A
40 CFR 63.10(b)(2)(xiv)	Do records exist of all documentation supporting initial notifications and notifications of compliance required under 40 CFR 63.9? Started recordkeeping 4th Q 2005. Submitted OYM Plan.	The permit application submitted to DERM for the new plant serves as the facility's initial notification. The facility also submitted notification of the actual date of startup within 15 days of that date, but has not submitted a notice of compliance status.	N	M/A	O	RK	A
40 CFR 63.10(c)(1)	If the source is required to install a CMS, do records exist of all required CMS measurements (including monitoring data recorded during unavoidable CMS breakdowns and out-of-control periods)?	Currently, no procedure or documentation is in place to record malfunctions or breakdowns on the CMS.	N	M/A	O	RK	A
40 CFR 63.10(c)(10)	If the source is required to install a CMS, does a record exist of the nature and cause of any malfunction (if known)? NOTE: the Startup, Shutdown, and Malfunction Plan, or records kept to satisfy the recordkeeping requirements of the Startup, Shutdown, and Malfunction Plan, may be used provided that such plan and records adequately address this requirement.	A SSM Plan has not been prepared. Adequate records of the nature and cause of malfunctions do not exist. Plan developed/implemented 1st Q 2006.	N	M/A	CSM	RK	A
40 CFR 63.10(c)(11)	If the source is required to install a CMS, does a record exist of the corrective action taken or preventive measures adopted? NOTE: the Startup, Shutdown, and Malfunction Plan, or records kept to satisfy the recordkeeping requirements of the Startup, Shutdown, and Malfunction Plan, may be used provided that such plan and records adequately address this requirement.	No formal documentation of maintenance or adjustments to thermocouple monitoring system were identified. Plan put into place 3rd Q 2006.	N	M/A	CSM	RK	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(c)(12)	If the source is required to install a CMS, does a record exist of the nature of the repairs or adjustments to the CMS that was inoperative or out of control? NOTE: the Startup, Shutdown, and Malfunction Plan, or records kept to satisfy the recordkeeping requirements of the Startup, Shutdown, and Malfunction Plan, may be used provided that such plan and records adequately address this requirement.	A SSM Plan has not been prepared. No formal documentation of maintenance or adjustments to thermocouple monitoring system were identified. Program implemented 3rd Q 2005.	N	M/A	CSM	RK	A
40 CFR 63.10(c)(13)	If the source is required to install a CMS, does a record exist of the total process operating time during the reporting period?	This data for the thermocouple monitoring system was not identified.	N Corrected 3rd Q 2005.	M/A	O	RK	A
40 CFR 63.10(c)(14)	If the source is required to install a CMS, does a record exist of all procedures that are part of a quality control program developed and implemented for the CMS under 40 CFR 63.8(d)? Developing/implementing 2nd Q 2006.	A formal QA/QC (CMS) plan for the COMs does not exist. In addition, quarterly calibrations of the thermocouple are not being performed.	N	M/A	O	RK	A
40 CFR 63.10(c)(5)	If the source is required to install a CMS, does a record exist of the date and time identifying each period during which the CMS was inoperative, except for zero (low-level) and high-level checks?	No system is in place to record these events. New DAHS installed March 2006.	N	M/A	O	RK	A
40 CFR 63.10(c)(6)	If the source is required to install a CMS, does a record exist of the date and time identifying each period during which the CMS was out-of-control, as defined in 40 CFR 63.8(c)(7)?	No system is in place to record these events. New DAHS installed March 2006.	N	M/A	O	RK	A
40 CFR 63.10(c)(7)	If the source is required to install a CMS, does a record exist of the specific identification (i.e., the date and time of commencement and completion) of each period of excess emissions and parameter monitoring exceedances, as defined in the relevant standard(s), that occurs during startups, shutdowns, and malfunctions of the affected source?	Records of excess emissions events are incomplete. The facility has not defined SSM events or prepared an SSM Plan to know which events constitute a SSM. New DAHS installed March 2006. SSM recordkeeping implemented 3rd Q 2005.	N	M/A	CSM	RK	A
40 CFR 63.10(c)(8)	If the source is required to install a CMS, does a record exist of the specific identification (i.e., the date and time of commencement and completion) of each time period of excess emissions and parameter monitoring exceedances, as defined in the relevant standard(s), that occurs during periods *other than* startups, shutdowns, and malfunctions of the affected source? New DAHS installed March 2006. SSM recordkeeping implemented 3rd Q 2005.	Records of excess emissions events are incomplete. The facility has not defined SSM events or prepared an SSM Plan to know which events constitute "periods other than SSM."	N	M/A	O	RK	A
40 CFR 63.10(d)(2)	Has a Title V permit been issued to the source? If not, has the source reported the results of a required performance test to the EPA? Have the results been reported before the close of business on the 60th day following the completion of the performance test, unless otherwise specified?		Y	M/A	PT	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(d)(2)	Has a Title V permit been issued to the source? If so, has the source reported the results of a required performance test to the delegated authority? Have the results been reported before the close of business on the 60th day following the completion of the performance test, unless otherwise specified?		Y	M/A	PT	RP	A
40 CFR 63.10(d)(2)	Have the results of the performance test been submitted as part of the Notification of Compliance Status?	No Notification of Compliance Status has been submitted.	N	M/A	PT	RP	A
40 CFR 63.10(d)(3)	Have opacity or visible emission results (produced using Method 9 or Method 22, or an alternative to these test methods) along with the results of the performance test been reported? If no performance test is required, or if visibility or other conditions prevent the opacity or visible emission observations from being conducted concurrently with the required performance test, have the opacity or visible emission results been reported before the close of business on the 30th day following the completion of the opacity or visible emission observations?	COMs data was submitted along with the D/F and PM performance test report. Initial Method 9s were performed on the affected sources; However, the results were not submitted within 30 days following the tests.	N	M/A	O	RP	A
40 CFR 63.10(d)(4)	Has the source received a compliance extension under 40 CFR 63.6(i)? If so, have the progress reports required as a condition of receiving an extension of compliance been submitted to the delegated authority by the dates specified in the written extension of compliance?		NA	M/A	CEX	RP	A
40 CFR 63.10(d)(5)(i)	If a Startup, Shutdown and Malfunction Report was submitted, and actions taken during the startup, shutdown or malfunction *were consistent* with the Startup, Shutdown and Malfunction Plan, did the report include a letter containing the name, title, and signature of the owner or operator or other responsible official who is certifying its accuracy?	A SSM Plan has not been prepared. A certified report has not been submitted. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(d)(5)(i)	If a startup, shutdown, or malfunction occurred during the reporting period and if actions taken *were consistent* with the Startup, Shutdown and Malfunction Plan, was a startup, shutdown, and malfunction report delivered or postmarked to the delegated authority by the 30th day following the end of each calendar half (or other calendar reporting period, as appropriate), or more frequently, as established by the delegated authority? NOTE: if the source is required to submit excess emissions and CMS performance (or other periodic) reports, the startup, shutdown, and malfunction report may be submitted simultaneously with the excess emissions and CMS performance (or other) reports.	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A
40 CFR 63.10(d)(5)(i) 40 CFR 63.6(e)(3)(iii)	If a Startup, Shutdown and Malfunction Report was submitted, and actions taken during the startup, shutdown or malfunction *were consistent* with the Startup, Shutdown and Malfunction Plan, did the report state that actions taken were consistent?	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006	N	M/A	CSM	RP	A
40 CFR 63.10(d)(5)(ii)	If a startup, shutdown, or malfunction occurred and actions were taken which *were not consistent* with the Startup, Shutdown and Malfunction Plan, did the report submitted describe whether any excess emissions and/or parameter monitoring exceedances are believed to have occurred?	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A
40 CFR 63.10(d)(5)(ii)	If a startup, shutdown, or malfunction occurred and actions were taken which *were not consistent* with the Startup, Shutdown and Malfunction Plan, did the report submitted contain an explanation of the circumstances of the event?	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006	N	M/A	CSM	RP	A
40 CFR 63.10(d)(5)(ii)	If a startup, shutdown, or malfunction occurred and actions were taken which *were not consistent* with the Startup, Shutdown and Malfunction Plan, did the report submitted contain the name, title, and signature of the owner or operator or other responsible official who is certifying its accuracy?	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A
40 CFR 63.10(d)(5)(ii)	If a startup, shutdown, or malfunction occurred and actions were taken which *were not consistent* with the Startup, Shutdown and Malfunction Plan, did the report submitted contain the reasons for not following the Startup, Shutdown, and Malfunction Plan?	A SSM Plan has not been prepared. A certified SSM report has not been submitted by the 30th day following the calendar half. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A

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Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(d)(5)(ii)	If a startup, shutdown, or malfunction occurred and actions were taken which *were not consistent* with the Startup, Shutdown and Malfunction Plan, was a report stating the actions taken submitted within 2 working days after commencing the inconsistent actions, and a letter postmarked or delivered within 7 days of the end of the event?	A SSM Plan has not been prepared. A report was not submitted within 2 working days and/or a letter postmarked within 7 days of the event. Recordkeeping implemented; first report submittal July 2006.	N	M/A	CSM	RP	A
40 CFR 63.10(e)(1)	If more than one CEM is used, are the results for each CEM reported unless the data are from a backup CEM?		NA	M/A	O	RP	A
40 CFR 63.10(e)(2)	Have the CMS performance evaluation report and the results of the performance test both been submitted to the delegated authority?	The D/F and PM performance test report was submitted to DERM. However, there is no evidence that the COMs performance evaluation report was submitted to DERM.	N	M/A	O	RP	A
40 CFR 63.10(e)(2)(ii)	If a COM system is used, have two (or 3 if requested) copies of the COM system performance evaluation report been submitted to the delegated authority at least 15 days before the performance test was conducted?	There is no evidence that two copies of the COM system performance evaluation report were submitted to DERM 15 days before the test was conducted.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(i)	If a CMS is used, has an excess emissions and continuous monitoring system performance report and/or a summary report been submitted to the delegated authority semiannually?	A semi-annual excess emissions and CMS performance report has not been submitted to DERM. ~~Recordkeeping implemented; first report submittal July 2006.~~	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(i)(A)	If a CMS is used and more frequent reporting is specifically required by a relevant standard, has an excess emissions and continuous monitoring system performance report and/or a summary report been submitted on this more frequent reporting basis?		NA	M/A	O	RP	A
40 CFR 63.10(e)(3)(i)(B)	If a CMS is used and the delegated authority has determined that more frequent reporting is necessary to accurately assess the source's compliance status, has an excess emissions and continuous monitoring system performance report and/or a summary report been submitted on the reporting basis defined?		NA	M/A	O	RP	A
40 CFR 63.10(e)(3)(i)(C)	If CMS data is used to demonstrate compliance, and the source experienced excess emissions, has an excess emissions report been submitted to the delegated authority quarterly, until a request to reduce the reporting frequency has been approved?		NA	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(e)(3)(ii)(A)-(C)	If a source has requested a reduction in the excess emissions reporting frequency, in the event quarterly or more frequent excess emissions reports have been required, have the following conditions been met: (A) The affected source's excess emissions and continuous monitoring system performance reports continually demonstrate that the source is in compliance with the relevant standard, for one full year; (B) the owner or operator continues to comply with all recordkeeping and monitoring requirements specified in 40 CFR 63 Subpart A and the relevant standard; and (C) the delegated authority does not object to a reduced frequency of reporting for the affected source, as provided in 40 CFR 63.10(e)(3)(iii)?		NA	M/A	O	WP	A
40 CFR 63.10(e)(3)(iii)	If a source has reduced its excess emissions reporting frequency, in the event quarterly or more frequent reports were required, was the delegated authority notified in writing of the intention to make such a reduction, and did the delegated authority approve of the intended change? NOTE: In deciding whether to approve a reduced frequency of reporting the delegated authority may review information concerning the source's entire previous performance history during the 5-year recordkeeping period prior to the intended change, including performance test results, monitoring data, and evaluations of an owner or operator's conformance with operation and maintenance requirements.		NA	M/A	O	RP	A
40 CFR 63.10(e)(3)(iv)	If the CMS data indicate that the source is not in compliance with any emission limitation or operating parameter specified in the relevant standard, has the frequency of reporting been in accordance with the frequency specified in the relevant standard, and has an excess emissions and continuous monitoring system performance (and summary) report for the noncomplying emission points been submitted at the next appropriate reporting period following the noncomplying event?		NA	M/A	O	RP	A
40 CFR 63.10(e)(3)(v)	If an excess emissions and monitoring system performance report and/or summary report has been required, did it include all the information required in 40 CFR 63.10(c)(5) through (c)(13), in 40 CFR 63.8(c)(7) and (c)(8), and in the relevant standard? Further, did the reports contain the name, title, and signature of the responsible official who is certifying the accuracy of the report? When no excess emissions or exceedances of a parameter have occurred, or a CMS has not been inoperative, out-of-control, repaired, or adjusted, was such information stated in the report?	Excess emission and CMS performance and/or summary reports have not been submitted by the 30th day following the calendar quarter or half. New DAHS install scheduled March 2006. Recordkeeping/reporting start July 2006.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(e)(3)(v)	If an excess emissions and monitoring system performance report and/or summary report has been required, was it delivered or postmarked by the 30th day following the end of each calendar half or quarter, as appropriate?	Excess emission and CMS performance and/or summary reports have not been submitted by the 30th day following the calendar quarter or half.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)	If a CMS is used, has a summary report been submitted as required under 40 CFR 63.10 (e)(3)(vii) and (e)(3)(viii)?	The semi-annual summary report has not been submitted. The summary report is required if the total duration of excess emissions or process or control system parameter exceedances for the reporting period is less than 1 percent of the total operating time, and CMS downtime for the reporting period is less than 5 percent.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(A) and (B)	If a CMS is used, has the summary report submitted been entitled "Summary Report--Gaseous and Opacity Excess Emission and Continuous Monitoring System Performance" and did it contain the company name and address of the affected source and an identification of each hazardous air pollutant monitored at the affected source?	A semi-annual summary report has not been submitted. Recordkeeping implemented; first report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(C) and (D)	If a CMS is used, did the summary report submitted contain the beginning and ending dates of the reporting period and a brief description of the process units?	A semi-annual summary report has not been submitted. Recordkeeping implemented; first report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(E) and (F)	If a CMS is used, did the summary report submitted contain the emission and operating parameter limitations specified in the relevant standard(s) and the monitoring equipment manufacturer(s) and model number(s)?	A semi-annual summary report has not been submitted. Recordkeeping implemented; first report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(G) and (H)	If a CMS is used, did the summary report submitted contain the date of the latest CMS certification or audit and the total operating time of the affected source during the reporting period?	A semi-annual summary report has not been submitted. Recordkeeping implemented; first report submittal July 2006.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(e)(3)(vi)(I)	If a CMS is used, did the summary report submitted contain an emission data summary (or similar summary if the owner or operator monitors control system parameters), including the total duration of excess emissions during the reporting period (recorded in minutes for opacity and hours for gases), the total duration of excess emissions expressed as a percent of the total source operating time during that reporting period, and a breakdown of the total duration of excess emissions during the reporting period into those that are due to startup/shutdown, control equipment problems, process problems, other known causes, and other unknown causes?	A semi-annual summary report has not been submitted. Programs have been put into place to record the necessary parameters. First report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(J)	If a CMS is used, did the summary report submitted contain a CMS performance summary (or similar summary if the owner or operator monitors control system parameters), including the total CMS downtime during the reporting period (recorded in minutes for opacity and hours for gases), the total duration of CMS downtime expressed as a percent of the total source operating time during that reporting period, and a breakdown of the total CMS downtime during the reporting period into periods that are due to monitoring equipment malfunctions, nonmonitoring equipment malfunctions, quality assurance/quality control calibrations, other known causes, and other unknown causes?	A semi-annual summary report has not been submitted. Programs have been put into place to record the necessary parameters. First report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vi)(K), (L) and (M)	If a CMS is used, did the summary report submitted contain a description of any changes in CMS, processes, or controls since the last reporting period, the name, title, and signature of the responsible official who is certifying the accuracy of the report, and the date of the report?	A semi-annual summary report has not been submitted. Programs have been put into place to record the necessary parameters. First report submittal July 2006.	N	M/A	O	RP	A
40 CFR 63.10(e)(3)(vii)	Was a summary report submitted semiannually, or more frequently as defined in 40 CFR 63.10(e)(3)(i), if the total duration of excess emissions or process or control system parameter exceedances for the reporting period was less than 1% of the total operating time for the reporting period, and CMS downtime for the reporting period was less than 10% of the total operating time for the reporting period? Programs have been put into place to record the necessary parameters. First report submittal July 2006.	The semi-annual summary report has not been submitted. The summary report is required if the total duration of excess emissions or process or control system parameter exceedances for the reporting period is less than 1 percent of the total operating time, and CMS downtime for the reporting period is less than 5 percent.	N	M/A	O	RP	A

Regulatory Citation	Requirement	Comments	Compliance (Y/N/NA)?	Major or Area	Compliance Event	Requirement Type	Affected Source
40 CFR 63.10(e)(3)(viii)	Were the excess emissions and continuous monitoring system performance reports, AND the summary report submitted semiannually, or more frequently as defined in 40 CFR 63.10(e)(3)(i), if the total duration of excess emissions or process or control system parameter exceedances for the reporting period was 1% *or greater* of the total operating time for the reporting period, and CMS downtime for the reporting period was 10% *or greater* of the total operating time for the reporting period? Programs have been put into place to record the necessary parameters. First report submittal July 2006.	The semi-annual summary and/or excess emissions and CMS performance reports have not been submitted. Both reports are required to be submitted if the total duration of excess emissions or process or control system parameter exceedances for the reporting period was 1% *or greater* of the total operating time, and CMS downtime for the reporting period was 10% *or greater*.	N	M/A	O	RP	A

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Coal Handling System

3. Emissions Unit Identification Number: **026**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Emissions unit consists of Coal Handling System for the Pyroprocessing Operation, including coal/petcoke feed bins, coal mill, and storage bins.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (6)

   Process Enclosure

2. Control Device or Method Code(s): **018, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **263,000**	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

Maximum process rate reflects coal/petroleum coke throughput.

Maximum process rate on 24-hour block average -
Pet Coke 20 TPH
Coal/Pet Coke 30 TPH

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 026**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **See Attachment TM-EU1-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common: **EU 028 – Raw Mill and Pyroprocessing System**		
5. Discharge Type Code: **V**	6. Stack Height: **410** feet	7. Exit Diameter: **14** feet
8. Exit Temperature: **176** °F	9. Actual Volumetric Flow Rate: **54,500** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: **45,245** dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Refer to Attachment TM-EU1-C15 for point specific data. Data above reflect coal mill exit gas emitted through main stack.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Bulk Material Stockpiles: Coal.**		
2. Source Classification Code (SCC): **3-05-103-03**	3. SCC Units: **Tons Processed**	
4. Maximum Hourly Rate: **30**	5. Maximum Annual Rate: **263,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Maximum permitted 24-hour block average usage rate is 30 TPH. These rates are total for coal and petroleum coke. Maximum petroleum coke usage is 20 TPH, 24-hour block average.**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Bulk Material Conveyors; Coal.**		
2. Source Classification Code (SCC): **3-05-101-03**	3. SCC Units: **Tons Processed**	
4. Maximum Hourly Rate: **30**	5. Maximum Annual Rate: **263,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Maximum permitted 24-hour block average usage rate is 30 TPH. These rates are total for coal and petroleum coke. Maximum petroleum coke usage is 20 TPH, 24-hour block average.**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	018	WP
PM_{10}	054	018	WP

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.74** lb/hour **3.21** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.0095 gr/dscf or 0.01 gr/acf** Reference: **Vendor Information**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU1-F1.8 for hourly and annual emission calculations.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.74** lb/hour **3.21** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.0095 gr/dscf or 0.01 gr/acf** Reference: **Vendor Information**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU1-F1.8 for hourly and annual emission calculations.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 3

1. Visible Emissions Subtype: **VE20**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **20** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Initial test using EPA Method 9**	
5. Visible Emissions Comment: **Applies to baghouses 461.BF130, 461.BF230, and 461.BF350.** **Permit No. 0250020-017-AC/PSD-FL-360 and 40 CFR 60 Subpart Y, NSPS for coal preparation plants.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 3

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☐ Rule ☒ Other
3. Allowable Opacity: Normal Conditions: **10** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Initial Test using EPA Method 9**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC/PSD-FL-360 and Rule 40 CFR 63.1348. Applies to Coal Mill baghouse (461.BF500) and baghouses 461.BF750 and 461.BF650.**	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 3 of 3

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☐ Rule ☒ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC/PSD-FL-360. Applies to all baghouses except Coal Mill baghouse (461.BF500).**	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU1-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU1-C15

EMISSION POINT COMMENT

ATTACHMENT TM-EU1-C15
SUMMARY OF STACK PARAMETER DATA FOR THE COAL HANDLING SYSTEM (EU 026)

Emission Unit	Baghouse ID No.	Stack Height (ft)	Stack Diameter (ft)	Exhaust Flow Rate (acfm)	Exhaust Temperature (°F)
Coal Feed Bin	461.BF130	126	0.75 x 0.83	1,400	92
Pet Coke Feed Bin	461.BF230	126	0.75 x 0.84	1,400	92
Coal mill feed	461.BF350	75	14	5,550	92
Coal mill	461.BF500	410	1.00 x 1.25	54,500 [a]	176
Coal (Transfer) Surge Bin	461.BF650	67	0.42	294	178
Pet coke (Transfer) Surge Bin	461.BF750	67	0.42	294	178

[a] The coal mill vents through the plant main stack. Flow rate represents coal mill exhaust gas only.

ATTACHMENT TM-EU1-F1.8

EMISSION CALCULATIONS

ATTACHMENT TM-EU1-F1.8
COAL HANDLING SYSTEM (EU ID NO. 026) POTENTIAL EMISSION RATES

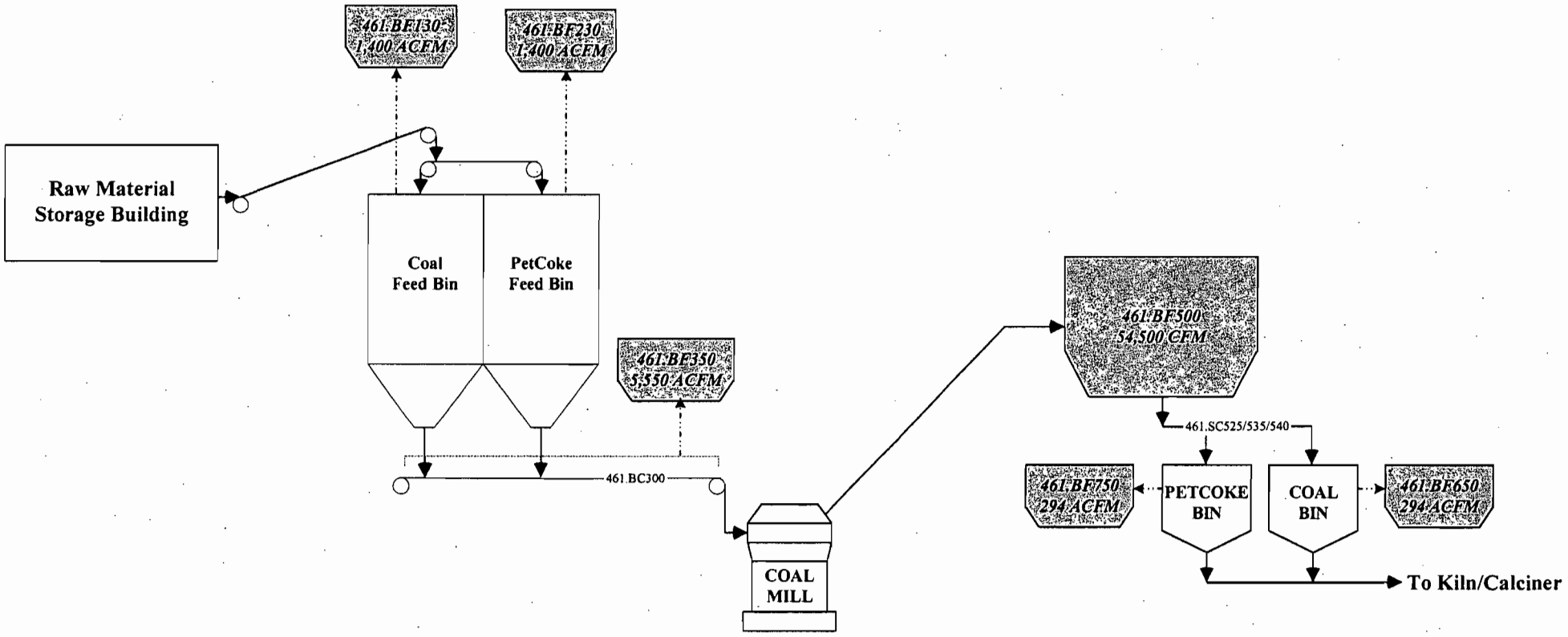
Emission Unit	Equipment ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate acfm	Exhaust Flow Rate dscfm	Temperature (°F)	Potential PM/PM10 Emission Rate[a] gr/dscf	gr/acf	lb/hr	TPY
Coal Feed Bin	461.BF130	8,760	1,400	1,339	92	0.0095	--	0.11	0.48
Pet Coke Feed Bin	461.BF230	8,760	1,400	1,339	92	0.0095	--	0.11	0.48
Coal mill feed	461.BF350	8,760	5,550	5,309	92	--	0.01	0.48	2.08
Coal mill	461.BF500	8,760	54,500	45,245	176	--	0.01	N/A[b]	N/A[b]
Coal (Transfer) Surge Bin	461.BF650	8,760	294	243	178	0.0095	--	0.020	0.087
Pet coke (Transfer) Surge Bin	461.BF750	8,760	294	243	178	0.0095	--	0.020	0.087
					Revised Potential Emission Rates =			**0.73**	**3.21**

[a] PM_{10} emission rate calculated as 100 percent of PM emission rate.

[b] The emission limit for the Main Stack (see Tables TM-EU4-F1.8a and TM-EU4-F1.8b for emissions from the Raw Mill and Pyroprocessing) of 0.063 lb/ton of dry clinker product includes emissions from the Coal Mill, which are also vented through the Main Stack.

ATTACHMENT TM-EU1-I1

PROCESS FLOW DIAGRAM



Coal Handling System [EU-026]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND	TITAN AMERICA
Attachment TM-EU1-I1 Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter	

ATTACHMENT TM-EU1-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU1-I3
CONTROL EQUIPMENT INFORMATION FOR COAL HANDLING SYSTEM

Source ID	Baghouse ID No.	Manufacturer	Model No.	Flow Rate acfm	Flow Rate dscfm	Cloth Area (ft^2)	Air to Cloth Ratio
Coal Feed Bin	461.BF130	FLS Airtech	36TAX10FM	1,400	1,339	469	3.0
Pet Coke Feed Bin	461.BF230	FLS Airtech	36TAX10FM	1,400	1,339	469	3.0
Coal mill feed	461.BF350	FLS Airtech	121CX10	5,550	5,309	1,575	3.5
Coal mill	461.BF500	FLS Airtech	735SX12	54,500	45,245	13,855	3.9
Coal (Transfer) Surge Bin	461.BF650	FLS Airtech	800/7	294	145	75	3.9
Pet coke (Transfer) Surge Bin	461.BF750	FLS Airtech	800/7	294	145	75	3.9

TM-EU1-I5

OPERATION AND MAINTENANCE PLAN

OPERATION AND MAINTENANCE PLAN
For NESHAP Subpart LLL

TITAN AMERICA, LLC.
Pennsuco Facility; Medley, FL

1.0 INTRODUCTION

1.1 Site History

TITAN AMERICA, LLC. (TITAN) owns and operates a portland cement manufacturing facility on its property, located in Medley, Miami-Dade County, Florida. The facility has manufactured cement at this location since the 1950s.

In 2004, TITAN commissioned a newly constructed, modern preheater/precalciner kiln system and associated process equipment. The existing, old wet kiln system and some associated process equipment was then shutdown and decommissioned. TITAN also commissioned a new finish mill (Finish Mill #6) and cement packhouse in 2005. The new process equipment has allowed TITAN to significantly increase its annual clinker and cement production and improve the fuel efficiency of its kiln system, without significantly increasing the facility's emissions of regulated pollutants.

1.2 Process Description

TITAN utilizes the following general processes to manufacture cement: 1) mining and crushing of limestone and procurement of other raw materials and fuels; 2) proportioning, drying, and grinding of raw materials to produce raw meal; 3) blending of raw meal and recycled kiln dust to produce kiln feed; 4) pyroprocessing of kiln feed to produce clinker; 5) cooling of clinker and heat recuperation; 6) finish grinding of clinker, gypsum, and additives to produce cement; and 7) bulk unloading and packing of the finished product.

1.2.1 Proportioning, Drying, and Grinding of Raw Materials & Fuels

Cement manufacture requires raw materials which contain high concentrations of calcium, silica, alumina, and iron. TITAN mines limestone, its primary raw material and calcium source for its process, from its on-site surface mine(s). The quarried limestone is sized to 8-inches or less in the primary crusher and conveyed by belt conveyor to the physical plant, where it is segregated

and stockpiled into blended limestone and high lime limestone fractions. This material is then reclaimed and stored under cover in the Raw Materials Storage Building (MSB).

Bauxite (alumina source), bottom ash (alumina and silica source), and mill scale (iron source) are obtained from third-party off-site suppliers and transported to the plant in haul trucks. These raw materials are also stockpiled in the MSB.

The raw materials are then reclaimed from the stockpiles and conveyed to their respective raw material storage bins.

Coal is the primary fuel used in TITAN's kiln. The coal is transported to the site in railcars and conveyed to the MSB or stored in outdoor stockpiles. The coal stored outside is reclaimed and stockpiled in the MSB.

Petroleum coke may also be used as a fuel in the future. It would be transported, processed, and stored in a similar manner as the coal.

Diesel fuel is used to heat the kiln system during the initial start-up of pyroprocessing system.

Propane gas is used to heat the kiln system initially during a warm startup of the pyroprocessing system.

1.2.2 Proportioning, Drying, and Grinding of Raw Materials & Fuels

Blended limestone, high lime limestone (sweetner), bauxite, and mill scale are reclaimed by a bridge stacker/reclaimer and transported to raw material storage bins. Feeders then proportion the raw materials onto the raw mill feed belt at rates designed to produce raw meal of the desired composition.

In the raw mill, the raw mill feed is dried, crushed, and ground, to a dry powder called raw meal. TITAN's raw mill is a roller type, in-line mill, which utilizes heat contained in the kiln system and clinker cooler exit gas streams to dry the raw materials. Cyclones separate the raw meal from the raw mill exit gases, and then the raw meal is transported via air slide and bucket conveyor to the CF silo for storage.

1.2.3 Blending of Raw Meal and Recycled Kiln Dust to Produce Kiln Feed

Exit gases from the kiln system, clinker cooler, and raw mill (when it is operational) pass through the kiln (main) baghouse, which is used to control emissions of particulate matter from

these processes. The fine material captured in the kiln baghouse is called kiln dust (CKD). The kiln dust is conveyed to a dust bin for storage.

The stored raw meal and kiln dust are then metered proportionally from the CF silo and dust bin to a common bucket elevator and transported to the top of the preheater. The resulting mixture, called kiln feed, is then introduced into the top stage of the preheater.

1.2.4 Pyroprocessing of Kiln Feed to Produce Clinker

TITAN's pyroprocessing system is a low NOx, air-through preheater/precalciner kiln, and consists of a rotary kiln, precalciner, and 5-stage preheater (the kiln system). The preheater can also be used as a 4-stage system. In the kiln system, the kiln feed is heated, calcined, and sintered to produce clinker, as the temperature of the material progressively increases from 150 deg F to 2,300 deg F.

To deliver the required heat input to the kiln system, pulverized coal is burned at the front-end of the rotary kiln and in the precalciner. Approximately 40 percent of the total fuel input is burned in the rotary kiln, and the balance is burned in the precalciner. Pulverized coal is burned in the precalciner at two different locations (staged combustion) under reducing conditions (at low O_2 conditions), to minimize thermal NOx production, and thereby minimize NOx emissions produced by the pyroprocessing operation.

1.2.5 Cooling of Clinker and Heat Recuperation

The clinker produced in the kiln system is flash cooled in TITAN's crossbar clinker cooler by blowing large volumes of ambient air, crosscurrent to the bed of hot clinker, as the crossbar slowly moves the material through the process. The clinker temperature at the exit of the clinker cooler is approximately 120 deg F. The cooled clinker is transferred to clinker cooler silos by a system of pan and belt conveyors for storage, prior to being ground in TITAN's finish mills to produce cement.

In the clinker cooler, a significant amount of the sensible heat contained is transferred from the clinker to the cooling air to produce a large volume of superheated air. The hottest fraction of this air is used to provide combustion air to the rotary kiln (secondary air) and to the precalciner (tertiary air) cooling air. This recuperated heat significantly reduces the fuel consumption required by the kiln system. The hot cooler air that is not used by the kiln system is then

transferred to the raw mill (during the 'raw mill on' condition) and then through the kiln (main) baghouse.

1.2.6 Finish Grinding of Clinker, Gypsum, and Additives to Produce Cement

To produce portland cement, clinker is ground with a relatively small proportion of natural gypsum in one of TITAN's five finish mills. Other additives, including limestone, grinding aids, and air entrainment agents are also introduced to the finish milling process, depending on the specific product which is being manufactured. TITAN produces Type I/II portland cement, Type M masonry cement, and stucco in its finish mills.

1.2.7 Storage & Bulk Unloading and Packing of Finished Products

The various cement products produced by the finish mills are pneumatically conveyed to cement storage silos. These products are then unloaded to bulk tanker trucks and railcars or are transferred to the packhouse for bagging. The bagged cement is palletized and transported off-site by flat bed trailers.

1.3 Emissions of Regulated Pollutants & Emission Control Devices and Procedures

During its cement manufacturing process, TITAN generates emissions of regulated pollutants. Because of the numerous dry materials that are handled, transported, and processed at the facility, emissions of particulate matter (PM) are potentially emitted from numerous point and area sources at the plant. Bag filters are the primary control device used to control PM emissions from process point sources. Water sprays and dust sweepers are used to minimize fugitive PM emissions from area sources, such as paved and unpaved roads and stockpiles.

Combustion emissions generated from burning large quantities of fuel in TITAN's kiln system are another source of emissions of regulated pollutants. Specific regulated pollutants produced during pyroprocessing include sulfur oxides (SO_x), nitrogen oxides (NO_x), carbon monoxide (CO), volatile organic compounds (VOCs), and dioxins and furans (D/F). TITAN minimizes the generation of these gaseous pollutants to the maximum practicable extent by carefully optimizing the fuel combustion process in its kiln system.

Kiln system exit gases containing PM and gaseous pollutants pass through the kiln (main) baghouse, in addition to exit gases from the raw mill and the clinker cooler. The kiln baghouse functions as the particulate matter control device (PMCD) for these processes, and the captured dust (kiln dust) is recycled back into the pyroprocessing system. The exit gases from the kiln

baghouse are exhausted to the facility's 410-feet in height, main stack. Exit gases from the coal mill, which have been filtered in the coal-mill baghouse, are also exhausted in the main stack.

1.4 Continuous Monitoring of Opacity and Gaseous Pollutant Emissions

TITAN monitors the main stack exhaust for opacity and the concentration of several gaseous pollutants, including SO_x, NO_x, and VOCs, using a continuous opacity monitor (COM) and continuous emission monitors (CEMS), respectively.

The concentration of oxygen and water vapor, temperature, and static and dynamic pressures of the main stack exhaust are also measured, so that the volumetric flow rate of the exhaust can be calculated. Main stack mass emissions of SO_x, NO_x, and VOCs are then calculated using the respective CEMS concentration outputs and the calculated volumetric flow rate.

TITAN also monitors the concentration of CO in the preheater exit gases using a continuous process analyzer. Main stack mass emissions of CO are estimated using the concentration output from this process analyzer, and the main stack volumetric flow rate calculated from various stack process measurements.

2.0 SUMMARY OF REGULATORY REQUIREMENTS

On June 14, 1999, the EPA promulgated final maximum achievable control technology (MACT) standards for the Portland cement manufacturing industry as mandated by the Clean Air Act. These regulations are part of the National Emission Standards for Hazardous Air Pollutants, hereafter referred to a NESHAP. Applicable NESHAP requirements for portland cement facilities are codified in Subpart LLL of Chapter 40 of the Code of Federal Regulations (40 CFR), Part §63 (PC-NESHAP). All cement-manufacturing facilities subject to Subpart LLL are also subject to certain general provisions of Subpart A of 40 CFR Part §63. In addition, EPA has issued a direct final rule amending Subpart LLL to incorporate details of a settlement reached between the American Portland Cement Association (APCA) and EPA.

In accordance with the NESHAP provisions, cement facilities are required to develop and implement an Operations and Maintenance (O&M) Plan. The O&M plan needs to document procedures for proper operation and maintenance of affected plant sources, including process equipment and air pollution control devices.

Additionally, the facility will operate in accordance with a Startup, Shutdown and Malfunction (SSM) Plan. The SSM Plan describes the procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction. The SSM Plan describes a program of corrective action for malfunctioning processes and air pollution control equipment.

The purpose of this document is to outline the operations and maintenance procedures that will fulfill the monitoring requirements specified in 40 CFR §63.1350 (PC-NESHAP monitoring requirements).

Therefore, this document is an essential tool that will be utilized by TITAN to document and demonstrate compliance with the O&M provisions as required by the NESHAP regulations. Any deviation from these procedures may trigger notification and additional reporting and record keeping requirements under the PC-NESHAP.

3.0 SUMMARY OF EMISSION AND OPERATING LIMITS

The facility will demonstrate compliance with the operating and emission limits established during the performance test. In addition to these operating and emission limits, the facility is required to operate and maintain monitoring equipment, and take corrective action when required. The facility will be subject to notification procedures and reporting requirements. The aforementioned requirements are briefly addressed below.

3.1 Emission Limits

Specific emission limits were established for kilns located at portland cement manufacturing facilities, for the following regulated pollutants.

- Total particulate matter (PM), which will be used as a surrogate for hazardous air pollutant (HAP) metals;
- Opacity;
- Dioxins/furans (D/F); and,
- Total hydrocarbons (THC), used as a surrogate for organic HAPs (for certain Greenfield PC-NESHAP units or sources subject to Subpart EEE).

The emission standard for D/F is the only new standard for facilities previously complying with 40 CFR §60, Subpart F of the New Source Performance Standards (NSPS). However, a major significant difference between NSPS Subpart F and NESHAP Subpart LLL is the level of effort necessary to demonstrate continuous compliance. Further, Subpart LLL creates a THC limit;

however, this applies only to new (Greenfield) cement kilns that are constructed after March 24, 1998.

3.2 Operating Limits

Additionally, the PC-NESHAP requires that each facility establish operating limits, and these limits are established during the performance test (PT). The main kiln-operating limit established by the PT is for the gas temperature at the inlet of the air pollution control device, which will serve as a surrogate for D/F emissions. The direct final rule altered the conditions for when the PT has to be repeated. In the direct final rule, it is stated that the PT must be repeated if a change in operations may have adversely affected compliance. Further, the PT only needs to be repeated for the pollutant related to the operational change that adversely affects compliance for that pollutant. The direct final rule, additionally, reaffirmed §63.7(e) of the General Provisions, which states that performance tests must be conducted under representative conditions.

Therefore, if the cement manufacturing facility plans to undertake a change in operations that may adversely affect compliance of PM and D/F (a so-called significant change), the facility can operate under the planned operational conditions for a period not to exceed 360 hours, provided that conditions §63.1349 (e)(3)(i) through (iv) are successfully met.

3.3 Performance Tests

Performance tests for PM, opacity, and D/F are required for both new and existing sources. Existing sources must conduct the PT within 180-days of the initial compliance date (June 14, 2002). The facility is required to re-establish the D/F emission limit every 30 months. Additionally, a full PT must be completed every 60 months for all affected emission sources. If necessary, the facility can reestablish more flexible operating limits during consequential PTs as long as the PT is conducted in accordance with emission requirements of PC-NESHAP regulation. Any new sources constructed after the compliance date will have to complete its PT within 180 days after startup. For Greenfield kilns, in-line kiln raw mills and raw material dryers, performance testing for THC is also required. The following table summaries the initial compliance PTs.

Table 1 - Performance Tests Required for Initial Compliance

Pollutant	Performance Test Method	Affected Sources	
PM	EPA Method 5.	Kiln In-line kiln/raw mill Clinker cooler	
Opacity (PM)	COM if feasible or EPA Method 9 visual opacity readings.	Kiln In-line kiln/raw mill Clinker cooler Raw Mill Finish mill Raw material dryer Raw Material Storage	Clinker storage Finished product storage Conveyor transfer points Bagging systems Bulk loading systems Bulk unloading systems
Dioxins/Furans (D/F)	EPA Method 23.	Kiln In-line kiln/raw mill	Dioxins/Furans (D/F)
THC	THC CEM (EPA PS-8A).	Greenfield kiln Greenfield In-line kiln/raw mill Greenfield raw material dryer	THC

After the initial PT, the facility will complete additional PTs for PM and opacity every five years, and PTs for D/F will be completed every 30 months. The specific performance testing requirements are summarized in Table 2. It should be noted that Method 5 performance testing is to be completed on the front-half sample collection only (i.e., the pseudo-particulate or condensable particulate matter, is not to be included in the comparison to the PC-NESHAP standard).

Table 2 – Frequency of Performance Tests

Pollutant	Frequency of Performance Test	Affected Sources	
PM	Every five years	Kiln In-line kiln/raw mill Clinker cooler	
Opacity (PM)	Every five years	Kiln In-line kiln/raw mill Clinker cooler Raw Mill Finish mill Raw material dryer Raw Material Storage	Clinker storage Finished product storage Conveyor transfer points Bagging systems Bulk loading systems Bulk unloading systems
Dioxins/Furans (D/F)	Every 30 months	Kiln In-line kiln/raw mill	
THC	Only initial test required	Greenfield kiln Greenfield In-line kiln/raw mill Greenfield raw material dryer	

3.4 Emissions Monitoring

The PC-NESHAP requires continuous monitoring of the temperature of the exhaust gas at the inlet to, or upstream of, the kiln or in-line kiln/raw mill PM control device. If feasible, continuous opacity monitoring is also required. In general, a COM would be required if the gas from the kiln or in-line kiln/raw mill exhausts through a single stack. The MACT clearly states that use of a COM is considered infeasible if the control device exhausts through a monovent, and may be determined infeasible in accordance with the installation specifications of EPA Performance Specification (PS)-1 of appendix B to 40 CFR 60. Where the control device discharges through a fabric filter with multiple stacks or an electrostatic precipitator with multiple stacks, the regulation indicates that the owner or operator has the option of installing a COM or using Method 9 to demonstrate compliance.

In addition to the continuous monitoring, the rule, additionally, requires continuous particulate matter emission monitoring, but this portion of the rule was stayed until future rulemaking.

The facility will also be required to conduct Method 22 visible emissions monitoring for the raw mill, finish grinds, bulk storage and loading, as well as other material handling operations (MHOs).

3.5 Recordkeeping and Reporting

The rule requires the development of various reports, plans, and notifications, as well as the maintenance of various records for compliance demonstration. These requirements are summarized below.

Notifications are required for the following:

- Rule applicability;
- Intention to conduct a performance test;
- Anticipated dates for conducting opacity or visible emission observations;
- Start date of continuous monitoring system (CMS) performance evaluations;
- Notification of compliance status (following a performance test); and
- Notification of planned construction or reconstruction.

Recordkeeping is required for the following:

- Records needed to demonstrate compliance with applicable requirements;
- Records of startups, shutdowns and malfunctions;
- Records related to operation of all continuous monitoring systems;
- Records of applicability determinations; and
- Documentation supporting initial notifications and notifications of compliance status.

The records must be maintained in a form suitable and readily available for inspection and review, and must be retained for at least five years following the date of each occurrence, measurement, maintenance, corrective action, report, or record. At a minimum, the most recent two years of data must be retained on site.

Reporting is required for the following:

- Performance test results;
- Periodic CMS summary report;
- Excess Emission and CMS performance report; and
- Periodic Startup, Shutdown and Malfunction report.

Besides the notifications and plans listed above, the rule requires various records be kept to verify compliance. A notification of compliance status must be made after each performance test conducted. The following reports are required on a periodic basis:

- Summary Report
- Excess Emissions and CMS Performance Report; and
- Startup, Shutdown, and Malfunction Report.

4.0 MONITORING REQUIREMENTS

To be compliant with the requirements of the PC-NESHAP an ongoing basis, TITAN is required to perform monitoring and to conduct performance testing on a periodic basis. Records documenting the required monitoring will be maintained in accordance with the requirements. In general, records will be maintained for a period not less than five years (where at least the most recent two years of data will be maintained on-site). All monitoring must be conducted based on procedures documented in this approved O&M Plan.

The PC-NESHAP regulations state that each plant shall prepare a written operation and maintenance plan. The plan shall be submitted to the applicable Title V permitting authority for approval and incorporation into the Title V permit. The O&M plan shall include the procedures for proper operations and maintenance of the affected sources and air pollution control devices. The affected sources include the raw mill, kilns, cooler, finish grind, and other material handling operations. In addition, the PC-NESHAP requires procedures to be used during an inspection of the components of the combustion system of each kiln and/or each in-line kiln/raw mill.

In addition, the plan should include corrective action procedures for the raw mill (i.e., not in-line) and finish grind (as required for compliance with 63.1350(e)), and associated particulate matter control devices (PMCDs), which must be implemented when required by the rule. The O&M plan shall include provisions for monitoring opacity from material handling sources.

Further, failures to implement procedures consistent with the approved plan have to be reported to the applicable Title V permitting authority.

5.0 MAINTENANCE PLAN

TITAN maintenance personnel carry out planned maintenance activities, preventive maintenance inspections, and equipment repair activities for equipment and air pollution control equipment.

Planned and preventive maintenance activities are initiated via a work order system based on an annual maintenance schedule for major equipment. To ensure equipment remains operating properly, a planned and preventive maintenance plan for all air pollution control equipment.

Notwithstanding these planned and preventive maintenance activities, when incident demands unplanned/corrective maintenance to be performed on any equipment, the work is initiated through a Data Stream Asset Management System (DSAMS) process. This is the first step in the maintenance corrective action process, and is essential for complying with the agency notification and reporting requirements. A DSAMS can be entered to repair any equipment that has malfunctioned, broken down, or is in need of additional analyses to ascertain the situation. When the required maintenance work is completed, and the maintenance supervisor verifies the work, the maintenance work order is closed. However, in some instances, the date when the work order is closed may not correspond to the completion date because the work was completed by an outside-contractor. Consequently, the work-order cannot be closed until all invoices from the outside-contractor have be received and processed. The completed maintenance work order will be retained for five years following the year when the work was completed.

6.0 OPERATIONS PLAN

The following addresses the operation of major process function units, such as the raw mill; kilns; clinker cooler; finish grinds; and material handling operations, which include transfer of stone into the raw mill, clinker handling area, raw material and fuel stockpiles, bulk loading and storage, pack-houses.

6.1 Kiln and Cooler

6.1.1 Particulate Matter

Emission limits applicable to the Kiln System include the following (i) particulate matter must not exceed 0.15 kg/Mg dry feed as measured by Method 5, front-half only; (ii) visible emission must not exceed 10 percent opacity, on a six-minute block average; (iii) Dioxin/furan emission must be less than 0.4 ng/dscm (TEQ), corrected to 7% oxygen, when the measured gas temperature at the inlet of air pollution control device is 400 degree F or less; (iv) Dioxin/furan emission must be less than 0.2 ng/dscm (TEQ), corrected to 7% oxygen when the measured gas temperature at the inlet of air pollution control device is greater than 400 degree F; (v) for all other equipment in the kiln system, visible emissions must not exceed 5 percent opacity, on a six-minute block average. Emission limits applicable to the clinker cooler in particulate matter must not exceed 0.05 kg/MG dry feed as measured by Method 5, front-half only, and visible emissions must not exceed 5 percent opacity, on a six-minute block average.

6.1.2 Opacity

In accordance with the specifications of §63.1350 (c), TITAN will monitor opacity from the kiln stacks and clinker cooler using a continuous opacity monitor (COM), unless it is infeasible to do so. The installed COM(s) will be calibrated, maintained, and continuously operated as described in the facility's COM Operations Manual.

The facility's COM Operations Manual includes the procedures for electronic adjustments, calibration functions, linearity checks, and installation requirements. The Operations Manual also addresses maintenance schedules; maintenance procedures and maintenance check sheet, and troubleshooting procedures.

During an opacity excursion, TITAN will investigate the cause of the excursion. TITAN's control room operator and shift foreman will review operating parameters, and if necessary, he/she will take corrective action. The corrective action is dictated by each specific incident; however, it may include, but is not limited to, the reduction of kiln speed, kiln ID fan speed, feed rate, dust return rate, and/or fuel rate, etc. After the control room operator and/or his supervisor has reviewed the operating parameters, and operating parameters are found to be adequate, the control room operator will request a Method 9 opacity (VE) measurement be taken. If the VE

readings suggest that the COM is not functioning properly, TITAN AMERICA will initiate corrective action via the PMN and in accordance with the COM's Operating Manual.

6.1.3 Dioxins and Furans

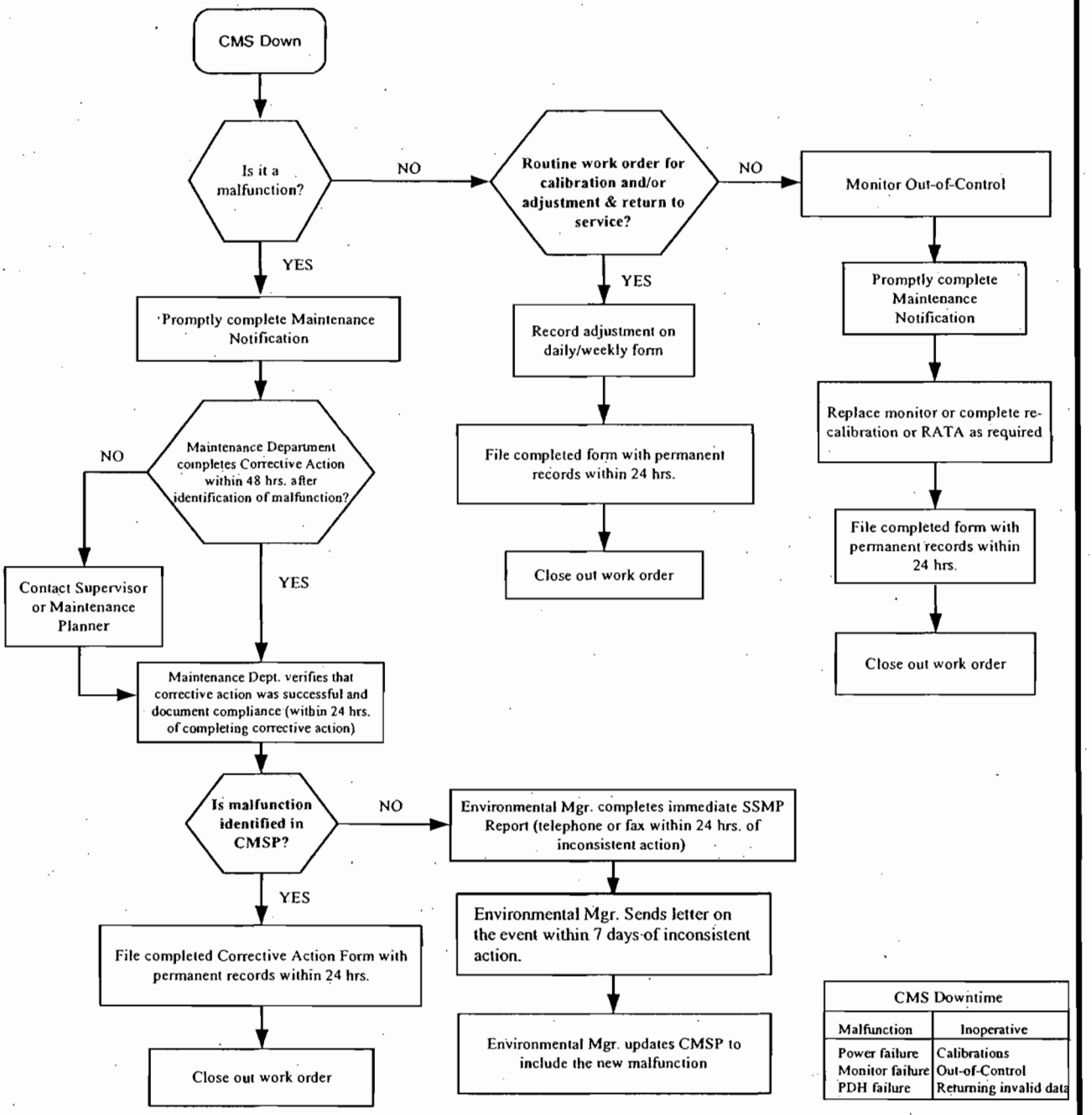
TITAN AMERICA will continuously monitor the temperature of kiln gases entering the air pollution control device in accordance with §63.1350 (f). The thermocouple will comply with the requirements set forth in §63.1350 (f)(1)(ii).. To satisfy this requirement, TITAN will purchase and replace existing National Institute of Standards and Technology (NIST) traceable thermocouples on a quarterly basis and re-certify the thermocouples to meet the NIST certification requirement. The span of the thermocouple will be approximately 1.5 times the average temperature established during the performance test.

Figure 1, titled "CMS Downtime Procedures" provides the general procedure to be followed for any malfunction related to any COM on the kiln or clinker cooler or any malfunction of the temperature thermocouple monitoring temperature of kiln gases.

The gas temperature will be measured by the NIST certified thermocouple to develop the three-hour (180-minute) rolling average at the inlet of the APCD. If a three-hour rolling average exceeds the three-hour operating limit established during the most recent performance test, TITAN will take corrective actions to decrease the inlet temperature to below the limit. This will be accomplished by either decreasing fuel input rate, increasing the kiln feed rate, or changing from mill on to mill off operations.

TITAN will monitor the type of fuel and feed utilized by the kiln. If fuel and feed change significantly (physical and/or chemically) to adversely affect the compliance status, the facility will repeat its performance test within ninety days as specified in §63.1349 (e)[a]. Therefore, if the facility plans such changes for fuel and/or feed, ample time should be allocated before its use.

CMS Downtime Procedures



6.1.4 Kiln Combustion Inspection

TITAN will conduct the required annual inspection of the kiln combustion system. The kiln combustion system consists of the burner pipe equipped with a fuel tip. TITAN personnel will typically remove the burner during the major refractory outage, and when it is installed, it is realigned. The coal pipe and, in some cases, the fuel tip or tips are replaced depending on wear.

6.2 Raw mill and/or Finish grind

In accordance with the specifications of §63.1350 (e), TITAN will conduct daily[b] Method 22 VE observations of the mill sweep and air separator baghouses following the procedures shown in Figure 2 (Visible Emissions Malfunction Procedures for Mills).

6.3 Material Handling Operations

Visible emissions for material handling operations must not exceed 5 percent opacity. The monitoring requirements specified in §63.1350 as related to MHOs refers to the handling of raw materials; clinker; finish product storage bins[c]; conveying system transfer points; bagging operations; and bulk loading and unloading systems. Figure 3, titled "Visible Emissions Malfunction Procedures for General Equipment", and provides the procedures for conducting NESAHP inspection for Material Handling Operations.

The requirement to conduct Method 22 VE monitoring will not apply for any totally enclosed conveying system transfer point, regardless of the location of the transfer point, provided it meets the criteria defined in §62.1350 (a)(4)(v). Further, if any partially enclosed or fully enclosed conveying transfer point is located in a building, TITAN has the option to either conduct the Method 22 VE inspection on each transfer point within the building or on the building itself. If VE from the building are monitored, then visible emissions from each side, roof, and vent(s) of the building will be monitored for one minute. The Method 22 VE inspection will be conducted under normal operating conditions.

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[b] EPA has agreed that sources that elect under the final rule to install continuous monitoring systems, such as continuous opacity monitors ("COMs") or broken bag detectors, on raw mills and finish grinds should not be required under § 63.1350 of the final rule to conduct daily Method 22 testing.

[c] EPA has agreed that the final rule should define the term "bin" as the term is used in §63.1340(b)(6). EPA will revise §63.1341 of the final rule to add the following definition: "Bin means a man-made enclosure for storage of raw materials, clinker, or finished product prior to further processing at a portland cement plant."

Figure 4, titled "Resolution of VE Due to Equipment Malfunction", and provides guidelines for addressing equipment malfunctions that have been repeatedly recorded. These guidelines require the development of short-term and long-term actions as per the findings of a root cause failure analysis process.

Figure 2

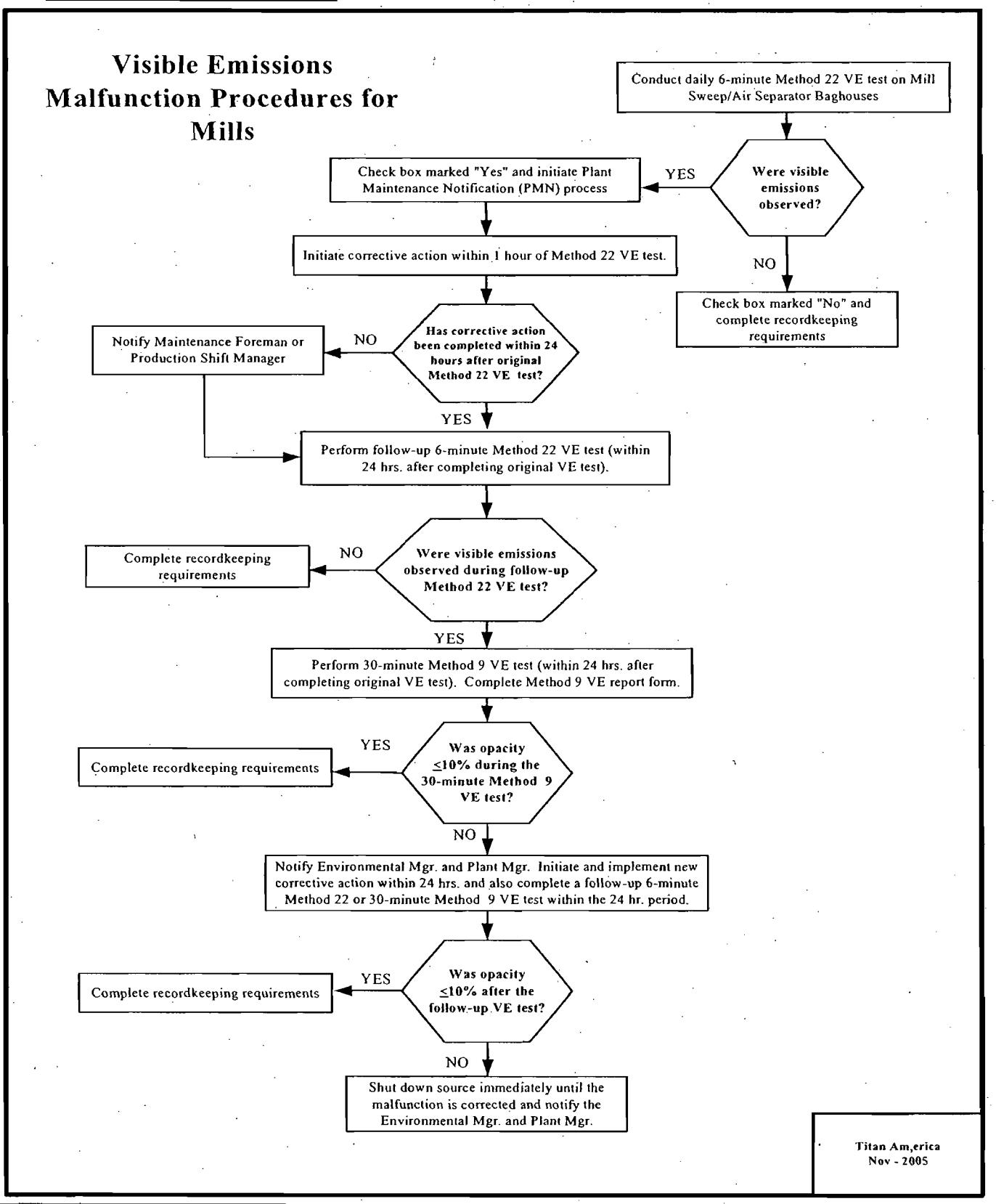
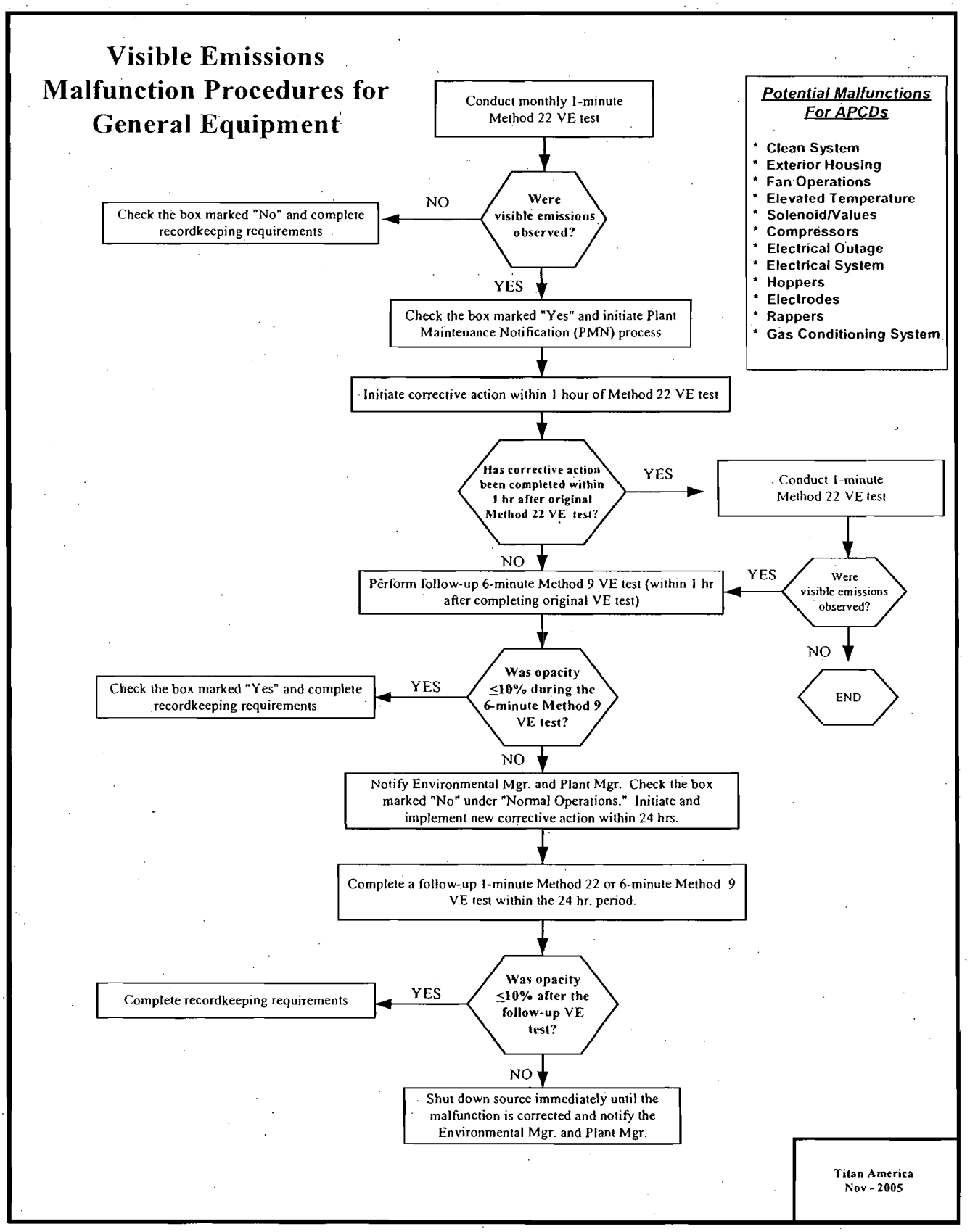

Visible Emissions Malfunction Procedures for Mills
Conduct daily 6-minute Method 22 VE test on Mill Sweep/Air Separator Baghouses
Were visible emissions observed?
YES
Check box marked "Yes" and initiate Plant Maintenance Notification (PMN) process
NO
Check box marked "No" and complete recordkeeping requirements
Initiate corrective action within 1 hour of Method 22 VE test.
Has corrective action been completed within 24 hours after original Method 22 VE test?
NO
Notify Maintenance Foreman or Production Shift Manager
YES
Perform follow-up 6-minute Method 22 VE test (within 24 hrs. after completing original VE test).
Were visible emissions observed during follow-up Method 22 VE test?
NO
Complete recordkeeping requirements
YES
Perform 30-minute Method 9 VE test (within 24 hrs. after completing original VE test). Complete Method 9 VE report form.
Was opacity ≤10% during the 30-minute Method 9 VE test?
YES
Complete recordkeeping requirements
NO
Notify Environmental Mgr. and Plant Mgr. Initiate and implement new corrective action within 24 hrs. and also complete a follow-up 6-minute Method 22 or 30-minute Method 9 VE test within the 24 hr. period.
Was opacity ≤10% after the follow-up VE test?
YES
Complete recordkeeping requirements
NO
Shut down source immediately until the malfunction is corrected and notify the Environmental Mgr. and Plant Mgr.
Titan America
Nov - 2005

Figure 3


Visible Emissions Malfunction Procedures for General Equipment
Conduct monthly 1-minute Method 22 VE test
Were visible emissions observed?
NO
Check the box marked "No" and complete recordkeeping requirements
YES
Check the box marked "Yes" and initiate Plant Maintenance Notification (PMN) process
Initiate corrective action within 1 hour of Method 22 VE test
Has corrective action been completed within 1 hr after original Method 22 VE test?
YES
Conduct 1-minute Method 22 VE test
Were visible emissions observed?
YES
NO
END
NO
Perform follow-up 6-minute Method 9 VE test (within 1 hr after completing original VE test)
Was opacity ≤10% during the 6-minute Method 9 VE test?
YES
Check the box marked "Yes" and complete recordkeeping requirements
NO
Notify Environmental Mgr. and Plant Mgr. Check the box marked "No" under "Normal Operations." Initiate and implement new corrective action within 24 hrs.
Complete a follow-up 1-minute Method 22 or 6-minute Method 9 VE test within the 24 hr. period.
Was opacity ≤10% after the follow-up VE test?
YES
Complete recordkeeping requirements
NO
Shut down source immediately until the malfunction is corrected and notify the Environmental Mgr. and Plant Mgr.
Potential Malfunctions For APCDs
* Clean System
* Exterior Housing
* Fan Operations
* Elevated Temperature
* Solenoid/Values
* Compressors
* Electrical Outage
* Electrical System
* Hoppers
* Electrodes
* Rappers
* Gas Conditioning System
Titan America
Nov - 2005

7.0 REPORTING VISIBLE EMISSIONS

Once a visible emission is identified as abnormal, the Control Room Operator will be notified of the observed condition. The Maintenance and/or Production Departments will evaluate the control device for malfunctions and perform the necessary corrective action to ensure normal control device performance. A notification should be put into the system immediately so that this malfunction is tracked and recording. The State Agency Notification might be necessary; the Plant Environmental Engineer will be notified.

If necessary, a written report shall be submitted to the Title V permitting authority. The written report shall, as a minimum, include the following:

- The identity of the stack and/or emission point where the excess emissions occurred.
- The magnitude of the excess emissions expressed in the units of the applicable emission limitation and the operating data and calculations used in determining the excess emissions.
- The time and duration of the excess emissions.
- The identity of the equipment causing the excess emissions.
- The nature and cause of such excess emissions.
- Action(s) that could be taken to prevent the reoccurrence of malfunction.
- The steps taken to limit the excess emissions.
- Documentation that the air pollution control equipment, process equipment, or processes were at all times maintained and operated, to the maximum extent practicable, in a manner consistent with good practice for minimizing emissions.

For the kiln system, reports of exceedances of limits will be submitted quarterly. Any changes in operating or monitoring parameters and/or any equipment malfunctions which result in exceedances of the emissions limitations must be reported to the Title V permitting authority Field Office.

8.0 PERODIC REVIEW & UPDATE OF O&M PLAN

The Environmental Manager will review the O&M Plan once per year for adequacy and currency. Documentation of the annual review or update will be retained in the Environmental Department files for five years.

8.1 Operation and Maintenance Plan Revisions History

Revision	Date	Purpose
1.0	November 11, 2005	Initial plan generation
2.0	February 23, 2006	Submittal

Inspection and Maintenance Procedures for Fabric Filter

TITAN AMERICA, LLC. (TITAN) operates pulse jet, plenum pulse, and cartridge-type dust collectors at its facility. The cement manufacturing facility utilizes primarily plenum pulse dust collectors, with all newly installed equipment associated with PenK5 (new precalciner/preheater kiln system and new raw material, coal, raw meal, kiln feed, kiln dust, clinker, and cement, processing, handling, and storage equipement associated with the new kiln system,) to control dust emissions.
Since 1998, several older reverse air dust collecters associated with the finish milling, cement storage, and cement unloading processes have been retrofitted with components to convert them to pulse jet dust collectors.

Several older plenum pulse dust collectors remain in operation with the unmodified elements of the clinker, finish milling, and cement handling, processing, and storage processes.

A combination of pulse jet and cartridge-type dust collectors are operated in the concrete batch and block plants.

TITAN maintains and operates the dust collectors at its manufacturing facilities utilizing
best engineering practices to meet 1) its own high internal performance standards, and 2) the requirements of dust collector operation and maintenance mandated under applicable regulations (PC MACT regulation, Subpart LLL).

An overview of these operation and maintenance procedures are detailed in this document. Titan evaluates and modifies these procedures periodically based on experience with the dust collector equipment. These changes are documented, explaining the reason(s) for the change(s) in operation and maintenance. The common elements and suggested procedures for performing routine preventive maintenance inspections of Titan's collectors.

To ensure that dust collectors are operating in accordance with best engineering practice, TITAN performs routine preventative maintenance on these units. Dust collector preventative maintenance includes routine inspection, monitoring, and maintenance. The various preventative maintenance activites are scheduled, tracked, and recorded using using Work Orders created in TITAN's DataStream asset management system

The following are some of the equipment components and performance parameters that may be inspected, monitored, and maintained as part of TITAN's preventative maintenance program.

For All Types of Dust Collectors

- Parameter Monitoring - Opacity of exhaust; pressure drop across fabric, compartments; fan amps.

- Baghouse Exterior Inspection - Includes cleaning system operation; cleaning method; overall condition of exterior housing, including structural members, access doors, and gaskets. External inspection will reveal visual evidence of corrosion; warping of panels; faulty or missing gaskets; and noise, odor, or elevated temperatures, which are indicators of worn bearings, overstressed fan belts, and electric motor problems.

- Baghouse Interior Inspection (when feasible) - Condition of bags, i.e., tears, pinholes, and inadequate tension; dust layer on floor plates; solenoid valves, poppet valves, mechanical linkages, and bag clamps.

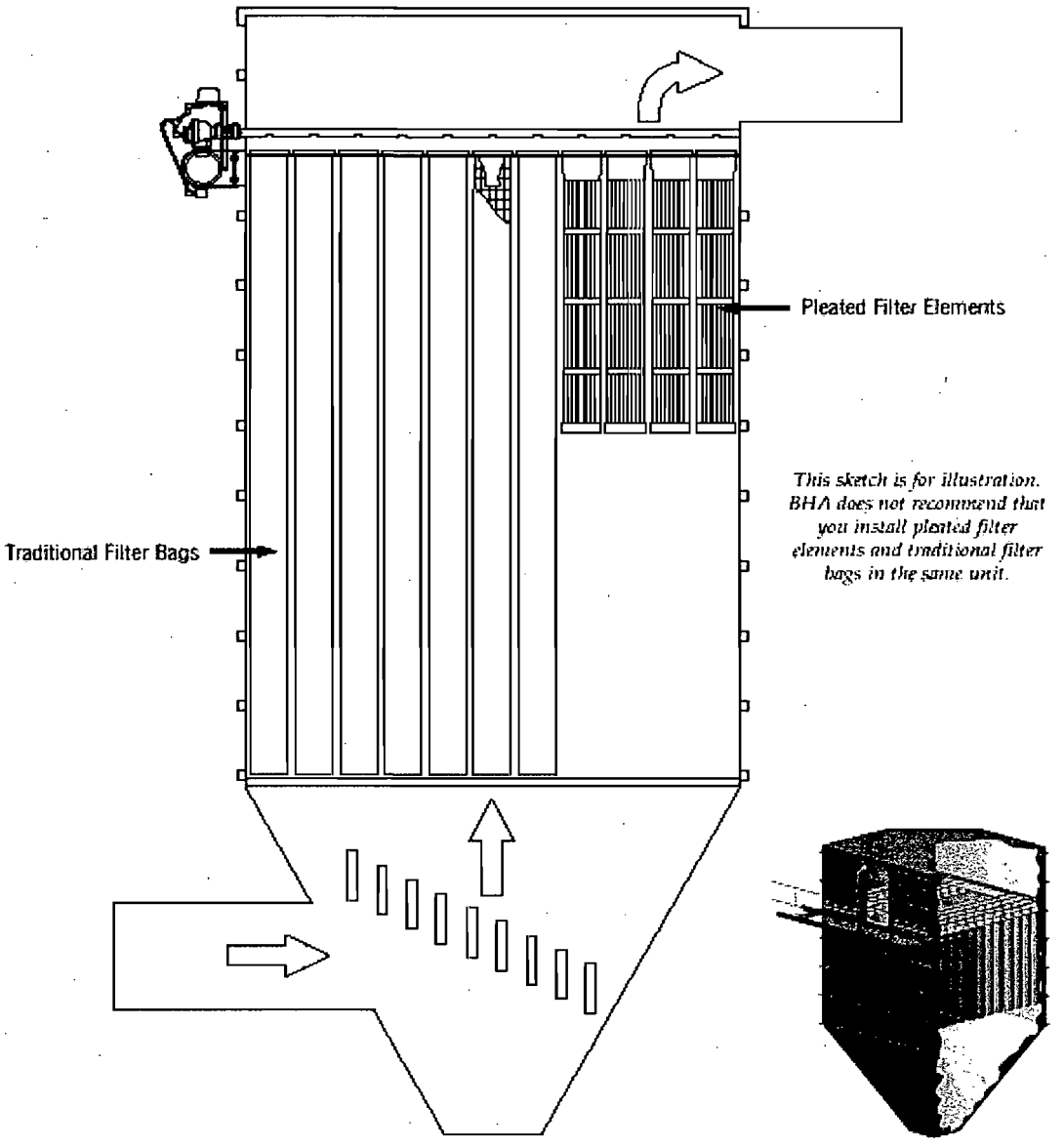
For Pulse Jet Dust Collectors

Evaluation of Plume Characteristic - The average opacity should be less than 5 %, and most all pulse-jet collectors operate with less than 5 percent opacity. If puffs are observed, the timing should be noted so that it is possible to identify the row being cleaned just before the puff.

Filtration System - The pressure drop across the collector should be noted. If there is a gauge, its proper operation should first be confirmed by observing meter response during the pulsing cycle. If the condition of the gauge or its connecting lines is questionable, one line at a time should be disconnected to identify any plugged or crimped lines (disconnecting lines may not be possible if a differential pressure transducer is connected to the gauge lines). In the absence of a properly operating gauge, a portable instruments could be used to measure the static pressure drop at isolated ports installed specifically for this purpose. It is important for measurements at the inlet and the outlet to be made separately so that plugged tap holes and lines can be identified. Additionally, the operation of the cleaning system should include the air reservoir pressure.

Compressed Air System - The compressed-air system should be inspected to determine whether it contains any water or rust deposits that could cause the system to malfunction. One quick method of checking whether the system has water or rust deposits is to open carefully the valve on the blow down system and to observe whether any water or other material is being expelled through the valve. Also, if the system has oil traps, the traps can be visually inspected to determine if they are retaining any water or other material.

FIGURE 1
PULSE-JET DUST COLLECTOR, TYPICAL CONSTRUCTION



Maintenance Inspections

Titan conducts routine visible emission monitoring of all dust collectors identified in the Operation and Maintenance Plan. The frequency of monitoring for each dust collector is based on the recommendations of the original equipment manufacture (OEM) and facilites' experience with its operational and maintenance history. The monitoring of visual emissions from each dust conducted is conducted at a frequency which ensures that equipment is operated according to best engineering practice and at a frequency that meets or exceeds the monitoring requirements of applicable regulations.

If dust collector emissions are observed to be greater than 5 percent opacity, according to procedures detailed in EPA Method 22, then TITAN will initiate corrective action procedures on this dust collector within 1 hour.

In most instances, the INITIAL step in TITAN's corrective action procedure will involve the following:

- A further evaluation will be performed by TITAN personnel trained to perform a more detailed assessment of the dust collector operation to determine the root cause of the visible emission.

Based on result of this detailed assessment, the following actions may be required:

- No further action, because the visible emission was the result of a temporary process malfunction or upset.
- Adjustment of the process operation controlled by the dust collector.
- Equipment repair by maintenance personnel.

If equipment repair is required by maintenance personnel, the following procedures will be implemented:

- A Work Order will be created and maintenance personnel will perform an evaluation of the dust collector within 24 hours of the visible emission's observation.
- Maintenance will then repair the dust collector in as timely manner as possible.
- After the maintenace has completed its repair, the dust collector exhaust will be observed for 30 minutes according to procedures detailed in EPA Method 9, to ensure that the dust collector has returned to normal operation. The evaluation will be performed by personnel who have received the appropriate Method 9 training and certification.
- After confirmation that dust collector has been returned to normal operation, the Work Order will then be updated (closed out) to indicate that the maintenance repair has been completed. Activities peformed to repair the dust collector will be documented in DataStream to allow for management of parts and the evaluation of preventive maintenance procedures.
- If the required maintenance cannot be completed within 24 hours of the original visual emission observation, then the appropriate regulatory authority(ies) will be notified.
- After the cause of

After the cause of the visible emission has been resolved, so that the opacity has been reduced to less than 5 percent, the following procedures will be performed:

- The dust collector

- The dust collector will be observed for 30 minutes according to procedures detailed in EPA Method 9. The evaluation will be performed by personnel who have received the appropriate Method 9 training and certification.

If the corrective action cannot be completed within 24 hours of the initial Method 22 visual observation, then the following procedures will be performed:

- The applicable regulating authority(ies) will be notified regarding the details of the incident (start time of exceedance, location, severity, root cause, schedule of proposed corrective action, etc.), and the dust collector will be repaired in as timely manner as possible.
- After the corrective action has been completed and confirmed by performance of the Method 9, the applicable regulating authority(ies) will be notified that dust the collector has been repaired and returned to normal operation.

All activities performed during the preventive and corrective maintenance of dust collectors will be conducted in accordance with TITAN's ***Confined Space Entry Program and Lock Out Tag Out Procedures.***

The dust collector process parameters and equpment that may be inspected on a routine basis are listed in Table 2 below.

The frequency routine inspections for each dust collector will be based on the size of the dust collector (actual cubic feet per minute of exhaust, etc.), the hours of operation of the dust collector, and any special characteristics of the process (corrosivity, temperature, and moisture content of the exhaust, and abrasivity of the dust, etc.). The frequency of routine dust collector inspections will be periodically evaluated and adjusted, if necessary, based on operational and maintenance experience.

TABLE 1
EXAMPLES OF DUST COLLECTOR PARAMETERS AND EQUIPMENT EVALUATED DURING PREVENTIVE MAINTENANCE INSPECTIONS

- Pressure drop across tube sheet
- Cleaning frequency and sequence
- Valves and dampers
- Dust removal
- Visible emissions from exhaust or from controlled process
- Discharge system components, such as screw conveyor bearings, air slide fabric, etc.
- Damper operation, bypass and isolation
- Compressed air lines, including line oilers and filters
- Accuracy of pressure and temperature gauges
- Fan drive components
- Bag connections
- Fan for corrosion and blade wear
- Check for bag leaks and holes using fluorescent dust
- Baghouse structure for evidence of corrosion, warping
- Ducts for dust buildup
- Damper valves for proper seating

In the event that the additional maintenance is required, a second Work Order will be created to ensure the required corrective maintenance is competed. After the corrective maintenance is completed, the dust collector performance will be evaluated to ensure that the dust collector is operating normally.

Common Equipment Malfunctions

Regardless of the cleaning mechanism involved, most fabric filter maintenance focuses on the bags and moving mechanical parts, especially components located on the dirty side of the tube sheet.

The highest maintenance item in fabric filter systems are the filter bags themselves. The most common problems are tears or pinholes, blinding (cake buildup), and bleeding (seepage). These problems can be diagnosed and subsequently minimized with preventive maintenance. Preventive maintenance, no matter how effective, will not eliminate all bag failures. Variations in fabric quality, sewing techniques, quality control, and gas flow distribution within the system may also contribute to bag failure. During the first several months of operation, a small number of bag failures may result from manufacturing or installation defects. Visible stack emissions will usually indicate a filter bag malfunction.

Basic troubleshooting techniques to correct some of the more commonly observed bag filter malfunctions are discussed below.

BAG FILTER TROUBLE SHOOTING GUIDE

Symptom	Cause	Remedy
High system pressure drop	System undersized	Consult manufacturer. Install double bags. Add more compartments or modules.
	Bag cleaning mechanism riot adjusted properly	Increase cleaning frequency. Clean for longer duration. Clean more vigorously (must check with manufacturer before implementing).
	Compressed-air pressure too low (JP)	Increase pressure. Decrease duration and/or frequency. Check air dryer, and clean N necessary. Check for obstruction in piping.
	Repressuring pressure too low (RA)	Speed up repressuring tan. Check for leaks. Check damper valve seals.
	Shaking riot vigorous (S)	Increase shaker speed (check with manufacturer).
	Isolation damper valves riot closing (S, RA, JP)	Check linkage. Check seals. Check air supply of pneumatic operations.
	Isolation damper valves riot opening (S, RA, JP)	Check linkage. Check air supply on pneumatic operations.
	Bag tension too loose (S, RA)	Tighten bags.
	Pulsing valves failed (JP)	Check diaphragm valves. Check solenoid valves.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
High system pressure drop (Cont'd)	System undersized	Consult manufacturer.
	Air volume greater than design	Damper system to design point. Install tan amperage controls.
	Cleaning timer failure	Check to see of timer is indexing to all contacts. Check output on all terminals.
	Not capable of removing dust from bags	Check for condensation on bags. Send sample of dust to manufacturer. Send bag to lab for analysis for blinding. Dry clean or replace bags. Reduce air flow.
	Excessive reentrainment of dust	Continuously empty hopper. Clean rows of bags randomly Instead of sequentially (JP).
	Incorrect pressure reading	Clean out pressure taps. Check hoses for leaks. Check for proper fluid in manometer. Check diaphragm in gauge.
Low fan motor amperage/low		
	High baghouse pressure drop	See high system pressure air volume
	Fan and motor sheaves reversed	Check drawings and reverse sheaves.
	Ducts plugged with dust	Clean out ducts and check duct velocities.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Low fan motor amperage/low (Cont'd)	System undersized	Consult manufacturer.
	Fan damper closed	Open damper and lock in position.
	System static pressure too high	Measure static on both sides and compare with design pressure.
	Fan not operating per design	Check fan inlet configuration and be sure even airflow exists .
	Bells slipping	Check tension and adjust.
Dust escaping at source	Low air volume	See above causes and remedies under low-fan motor amperage/low air volume.
	Ducts leaking	Patch leaks so air does not bypass source.
	Improper duct flow balancing	Adjust blast gates in branch ducts.
	Improper hood design	Close open areas around dust source. Check for cross drafts that overcome suction. Check for dust being thrown away from hood by belt..
Presence of Visible Emissions	Bags leaking	Replace bags. Tie off bags and replace at a late date. Isolate leaking compartment without upsetting system.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Visual Emissions of Emissions (Cont'd)		
	System undersized	Consult manufacturer.
	Bag clamps not sealing	Check and fighten clamps. Smooth out cloth under clamp and reclamp.
	Failure of seals in joints at clean/dirty air connection	Caulk and tighten clamps. Smooth out cloth under clamp and reclamp.
	Insufficient filter cake	Allow more dust to build up on bags by cleaning less frequently. Use a precoating of dust on bags (S, RA)
	Bags too porous	Send bag in for permeability test if neccessary.
Excessive fan wear	Fan handling too much dust	Check bags.
	Improper fan	Check with engineering department
	Fan speed too high	Check with manufacturer.
Excessive fan vibration	Buildup of dust on blades	Clean off and check to see if fan is handling too much dust. Do not allow any water in fan (check drain, look for condensation, etc.).

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Excessive fan vibration (Cont'd)	Buildup of dust on blades	Clean off and check to see if
	Wrong fan wheel for apptication	Check with manufacturer.
	Sheaves not balanced	Have sheaves dynamically balanced.
	Bearings worn	Replace bearings.
High compressed air consumption (JP)	Cleaning cycle too frequent	Reduce cleaning cycle if possible.
	Pulse too long	Reduce duration. (After initial shock all other compressed air is wasted.)
	Pressure too high	Reduce supply pressure if possible.
	Damper valves not sealing	Check linkage. Check seals.
	Diaphragm valve failure	Check diaphragms and springs Check solenoid valve.
Reduced compressed-air pressure (JP)	Compressed air consumption too high	Reduce supply pressure if possible.
	Restrictions in piping Dryer plugged	Check piping. Replace desiccant or bypass dryer if allowed.
	Supply line too small Compressor wom	Consult design. Replace rings.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Premature bag failure	Bag material improper for chemical composition of gas or dust	Analyze gas and dust. Check with engineering. Treat gas stream with neutralizer before it enters the system.
	Operating below acid dew point	Increase gas temperature. Bypass upon startup.
Moisture in system	System not purged after shutdown	Keep fan running for 5 to 10 minutes after process is shut down.
	Wall temperature below dew' point	Raise gas temperature. Insulate unit. Lower dew point by keeping moisture out of system.
	Cold spots at structural members	Fully insulate structural members.
	Compressed air introducing water (JP)	Check automatic drains . Install aftercooler. Install dryer.
	Repressuring air causing condensation (RA, JP)	Preheat repressuring air. Use process gas as a source of repressuring air.
High screw conveyor wear	Screw conveyor under-sized	Measure hourly collection of dust and consuft manufacturer.
	Conveyor speed too high	Slow down speed.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
High air-lock wear	Airlock undersized	Measure hourly collection of dust & consult manufacturer.
	Thermal expansion	Consult manufacturer to see if design allowed for thermal expansion.
	Speed too high	Slow the speed down.
Material bridging in hopper	Moisture in baghouse	Check moisture dew point of exhaust gas. Add hopper heaters.
	Dust being stored in hopper Hopper slope insufficient Conveyor opening too small	Remove dust continuously. Rework or replace hoppers. Use a wideflared trough.
Frequent screw conveyor/airlock failure	Equipment undersized	Consult manufacturer.
	Screw conveyor misaligned	Align conveyor.
	Overloading components	Check sizing to see that each component is capable of handling a 100% delivery from the previous component.
High pneumatic conveyor wear		
	Pneumatic blower too fast Piping undersized	Slow down blower. Review design and slow down blower or increase pipe size.
	Elbow radius too short	Replace with long radius elbows.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Pneumatic conveyor pipes plugging	Overloading pneumatic conveyor	Review design.
	Slug loading of dust	Check tackiness of dust.
	Moisture in dust	Check gas stream dew point.
Fan motor overloading	Air volume too high	Check ducts and structure for leaks.
	Motor riot sized for cold start	Damper fan at startup. Reduce fan speed. Provide heat faster. Replace motor.
Air volume too high	Ducts leaking Insufficient static pressure	Patch leaks. Close damper valve. Slow down fan.
Reduced compressed air consumption (RP, PP)	Pulsing valves riot working	Check diaphragms. Check springs. Check solenoid valves.
	Timer failed	Check terminal outputs.
High bag failure: wearing out	Baffle plate worn out	Replace baffle plate.
	Too much dust	Install primary collector.
	Cleaning cycle too frequent	Slow down cleaning.
	Inlet air not property baffled from bags	Consult manufacturer.
	Shaking too violent (S)	Slow down shaking mechanism (consult manufacturer).
	Repressuring pressure too high (RA)	Reduce pressure.

BAG FILTER TROUBLE SHOOTING GUIDE (Cont'd)

Symptom	Cause	Remedy
Pneumatic conveyor pipes	Overloading pneumatic	Review design.
	Pulsing pressure too high (JP)	Reduce pressure.
	Cages have barbs (JP)	Remove and smooth out barbs.
High bag failure: burning	Stratification of hot and cold gases	Force turbulence in duct with baffles.
	Sparks entering baghouse	Install spark arrestor.
	Thermocouple failed	Replace and determine cause of failure.
	Failure of cooling device	Review design and work with manufacturer.

ATTACHMENT TM-EU1-IV1

IDENTIFICATION OF APPLICABLE REQUIREMENTS

ATTACHMENT TM-EU1-IV1

LIST OF APPLICABLE REGULATIONS FOR THE COAL HANDLING SYSTEM

40 CFR 60.11(b) – General NSPS Requirements

40 CFR 60.11(c) – General NSPS Requirements

40 CFR 60.11(d) – General NSPS Requirements

40 CFR 60.12 – General NSPS Requirements

40 CFR 60.19 – General NSPS Requirements

40 CFR 252(c) – NSPS Subpart Y – Opacity Limitations

40 CFR 60.254(a) – NSPS Subpart Y – Test Methods and Procedures

40 CFR 60.254(b)(2) – NSPS Subpart Y – Test Methods and Procedures

40 CFR 60.7 – General NSPS Requirements

40 CFR 60.8 – General NSPS Requirements

62-296.320(4)(a) – Process Weight Table

STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL PROTECTION
NOTICE OF PERMIT

In the Matter of an Application for Air Construction Permit by:

Mr. Hardy Johnson, President Tarmac America, LLC 445 Fairway Drive Deerfield Beach, Florida 33441	DEP File No. 0250020-017-AC (PSD-FL-360) Titan Florida Pennsuco Cement Plant Production Increase Miami-Dade County, Florida

Enclosed is the Final Permit Number PSD-FL-360 (0250020-017-AC) to increase annual production at the Titan Florida Pennsuco Cement Plant in Medley, Miami-Dade County. This permit is issued pursuant to Chapter 403, Florida Statutes.

Any party to this order (permit) has the right to seek judicial review of the permit pursuant to Section 120.68, F.S., by the filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the Clerk of the Department in the Legal Office; and by filing a copy of the Notice of Appeal accompanied by the applicable filing fees with the appropriate District Court of Appeal. The Notice of Appeal must be filed within 30 (thirty) days from the date this Notice is filed with the Clerk of the Department.

Executed in Tallahassee, Florida.

Trina L. Vielhauer, Chief
Bureau of Air Regulation

CERTIFICATE OF SERVICE

The undersigned duly designated deputy agency clerk hereby certifies that this NOTICE OF FINAL PERMIT (including the FINAL permit) was sent by certified mail (*) and copies were sent by U.S. Mail or electronic mail before the close of business on 12/2/05 to the person(s) listed:

Hardy Johnson, Tarmac America*
Al Townsend, Titan
Daniel Crowley, Titan
Terry Lancaster, Titan
David A. Buff, P.E., Golder
Patrick Wong, Miami-Dade DERM
Darrel Graziani, DEP SED
Jim Little, EPA Region 4
John Bunyak, National Park Service

Clerk Stamp

FILING AND ACKNOWLEDGMENT FILED, on this date, pursuant to §120.52, Florida Statutes, with the designated Department Clerk, receipt of which is hereby acknowledged.

(Clerk) 12/2/05 (Date)

FINAL DETERMINATION

File No. 0250020-017-AC (PSD-FL-360)
Titan Florida Pennsuco Cement Plant
Medley, Miami-Dade County

The Department distributed a Public Notice package on October 14, 2005 for the project to increase operating hours and annual clinker production rate from 1,642,500 TPY to 2,190,000 TPY at the modernized cement plant. Titan Florida Pennsuco Cement Plant is located at 11000 NW 121 Way, Medley, Miami-Dade County. The Public Notice of Intent to Issue was published in the October 15th edition of The Miami Herald.

No requests for public meetings or administrative hearings were received on the Notice of Intent to Issue. Written comments were received from Titan. Miami-Dade DERM submitted recommended changes to the list of "Additional Reasonable Precautions for Emissions of Unconfined Particulate Matter" in Specific Condition 34. Titan's written comments are described below (italics) followed by the Department's responses.

The Department's representatives held teleconferences with Titan's representatives on November 8, November 19, and November 22 to fully discuss Titan's comments

SPECIFIC CONDITION NO. 4 and 25

Raw Mill and Finish Mill Monitoring

Titan proposed to modify Specific Conditions No. 4 and No. 25 by adding the following language:

The owner or operator of a raw mill or finish mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCDs of these affected sources, in accordance with the procedures of Method 22 of Appendix A of Part 60 of this chapter. The Method 22 test shall be conducted while the affected source is operating at the highest load or capacity level reasonably expected to occur within the day. The duration of the Method 22 test shall be six minutes. If visible emissions are observed during any Method 22 visible emissions test, the owner or operator must:

(1) Initiate, within one-hour, the corrective actions specified in the site specific operating and maintenance plan developed in accordance with paragraphs (a)(1) and (a)(2) of this section; and (2) Within 24 hours of the end of the Method 22 test in which visible emissions were observed, conduct a visual opacity test of each stack from which visible emissions were observed in accordance with Method 9. The duration of the Method 9 test shall be thirty minutes.

This language is an applicable requirement and it was already included within the Appendix LLL of the draft permit pursuant to Section 40 CFR 63.1350(e). Department agrees to duplicate the language in Specific Conditions 4 and 25 at the request of Titan.

SPECIFIC CONDITION NO. 9

Main Stack-Pyroprocessing/Raw Mill Emission Limits

Titan's comment on Note 2 of table: When does this 30 operating day block average(for CO, VOC, and SO_2) start? If I (Titan) operate 22 days and the kiln goes down for three days, we start adding to the 22 days again (after restart) until I have 30 days.

Titan's comment on Note 3 of the table: When does this 12 month rolling average(for NO_X) start?

The Department agrees with Titan's interpretation of operating day blocks. The starting date of the 30 operating day blocks and the 12 month rolling period is January 1, 2006 and will be shown in Condition 14 to which Notes 2 and 3 of Condition 9 refer.

SPECIFIC CONDITION NO. 12

Testing Procedures and Methods

Note 1 to Table: Titan asks for clarification as follows: You (the Department) are stating here that if the RATA is within the 20% allowed by the regulations than I (Titan) do not need to do annual SO_X, NO_X, CO, or VOC testing to a reference method?

Miami-Dade DERM provided the following comments on this issue: "RATA testing is done to ensure the accuracy of Continuous Emissions Monitors (CEMS). A RATA test is passed if the results are within 20% of the referenced method or 10% of the standard. This is therefore more relaxed than a regular compliance test.

"The Draft permit is requiring annual testing for CO, SO_2, NO_X and VOC, with an option to not test if the facility passes the annual RATA test. With this option they may never do a compliance test as long as they pass RATA. To provide reasonable assurance the facility should be required to do annual RATA testing and a compliance test every 5 years."

The Department is not stating that passing a Relative Accuracy Test Audit (RATA) obviates the need for an annual compliance test. Rather, conducting a RATA provides the opportunity to use the data from the associated referenced method to fulfill the independent initial and annual compliance test requirement. The criteria for passing or failing an initial or annual compliance test using the referenced method are independent from the concurrent RATA.

It is noted that the referenced test methods specified in the permit are instrumental methods rather than wet chemistry procedures or sampling by manual Orsat equipment, etc. The CEMS are calibrated using gases of known concentration in a manner similar to the way in which the modern reference method instruments are calibrated. The two instruments are much closer in precision and accuracy than suggested by the criteria (e.g. the 20% value) developed when cruder (1960's and 1970's) referenced methods were used.

Note 1 to the table in Condition 12 will be modified to read:

1. The tests conducted annually for the relative accuracy test audit (RATA) for the CEM system may be used to satisfy this requirement provided the owner or operator satisfies the prior notification requirements and emission testing requirements of this permit for performance and compliance tests. <u>The result from the actual referenced method (RM) test during the RATA needs to show compliance with the allowable permit emission limit.</u>

SPECIFIC CONDITION NO. 13

<u>Feed or Fuel Changes and D/F Performance Testing</u>

Titan proposed to modify Specific Condition No. 13 by replacing it with the following language:

The owner or operator is required to repeat the performance tests for kilns or in-line kiln/raw mills as specified in Appendix A, 40 CFR Part 60 within 90 days of initiating any significant change in the feed or fuel from that used in the previous performance test.

The Department's representatives discussed this matter with Titan's representative. The reasons for notification prior to the changes were discussed. Titan's representative pointed out that terms in the Department's language, such as "a physical or chemical change in feed", might be construed by personnel at the plant in such a manner that changes requiring notification will occur every day.

It was agreed that the notification requirement will remain in the permit as well as the language. However, Titan requested the opportunity in the future to develop language that will be clearer to plant personnel and encompass the changes that the Department actually needs to review.

SPECIFIC CONDITION NO. 14

Continuous Emission Monitoring Systems

Titan's representative verbally advised that the location of their CO monitor is in the downcomer, which is a section between the exit of gases from the preheater and the raw mill. Titan wishes to continue using the CO monitor located in the downcomer rather than installing another CO monitor in the stack.

The Department agrees with this request. At the point in the downcomer where the CO monitor is located, there is also an oxygen monitor and an additional NO_X monitor. At the downcomer location, it is likely that CO burnout has occurred. The Department will require that the CO monitor in the downcomer be subjected to annual RATA in the same fashion as the other CEMS. The concentration of CO in the exhaust gases in the downcomer is likely to be within the deviation allowed by a RATA when compared with CO concentrations in the stack.

Reference paragraph14 c (new pargraph14 d). Titan's comment on Valid Hour Averages: It is our understanding of (Data Acquisition Handling Systems) that samples are collected every ten seconds (and) must have 75% of the samples to be valid. In your (Department's) description here, we (Titan) could actual take a sample at 12:00 and not have to take another sample until 12:45 which would leave thirty minutes in between each sample. I (Titan) would ask that we change this wording to be more in line with federal regulations.

The issue was discussed in detail with Titan's representative. It is not necessary to change any language in this condition. For an hourly average to be considered valid, at least two data points separated by a period of 15 minutes or more must be used to compute the hourly average. It is understood that when more than two data points are available, all available data points must be used to calculate the hourly average. However, if due to CEM system malfunction, only the two data points as described above are available, then the hour is still considered valid.

Reference paragraph 14d (new paragraph 14e). Titan's comment on Data Availability: You (Department) are stating here that as long as I (Titan) have data for 90% of my total operating time for any six-month period I do not need to submit an excess emission report? Are you sure that is how you wanted that to read. In every state I've worked in it's always been and it states in the federal regulations that I must submit excess emission reports within thirty (30) days of the end of the quarter to the local permitting agency.

In response to Titan's written and verbal comments, the Department modifies Specific Condition Nos. 14 a. to f. as follows:

SPECIFIC CONDITION NO. 14

Continuous Emission Monitoring Systems: The owner or operator shall install, calibrate, maintain, and operate continuous emission monitoring systems (CEMS) in the in-line kiln/raw mill stack to measure and record the emissions of NO_X, SO_2, CO, and VOC from the in-line kiln/raw mill, in a manner sufficient to demonstrate compliance with the emission limits of this permit. Alternatively, the CO monitor located in the downcomer (between the preheater and in-line raw mill) calibrated, maintained and operated as a CEMS may be used (in lieu of a CO CEMS located in the stack) to measure and record CO in a manner sufficient to demonstrate compliance with the emission limits for CO. The CEMS systems shall express the results in units of pounds per ton of clinker produced, and pounds per hour. Emissions of VOC shall be reported in units of the standards (lb/hour, lb/ton clinker) and ppmvd as propane corrected to 7% oxygen.

a. *Compliance Demonstration*: Compliance with the short-term emission limits for NO_X, SO_2, CO, and VOC shall be based on a 24-hour block ~~rolling~~ average ~~that shall be recomputed after every valid hour as the arithmetic average of that hourly average and the preceding 23 all valid hourly averages~~. The 24-hour block shall begin at midnight of each operating day and shall be calculated from 24 consecutive hourly average values. If there are less than 24 hours during the block, the 24-hr block average shall be the average of all valid hourly average values available during the 24 hour block. Compliance with the long-term emission limits for SO_2, CO, and VOC shall be based on a 30 operating-day block average that shall be computed as the arithmetic average of all valid hourly averages occurring within each 30 operating-day block. For purposes of the SO_2, CO, and VOC long-term emission limits, an operating day is any day that the kiln produces clinker or fires fuel. The first 30 operating day block shall begin the first operating day on or after January 1, 2006.

b. *(New) Compliance with the CO emission limits when using downcomer CO monitor*: Oxygen content must be measured at the location of the downcomer CO monitor. Data from the downcomer CO monitor shall be corrected to accurately reflect stack CO concentrations and to calculate mass emissions. The CO stack tests required when conducting a RATA or demonstrating initial or annual compliance shall be conducted in the in-line kiln/raw mill stack.

c. *(Previously b) Compliance with the long-term NO_X emissions limit*: Compliance with the long-term NO_X emission limit shall be based on a 12 month rolling average that shall be recomputed each month as the arithmetic average of that month and the preceding 11 months. Each monthly average shall be computed by averaging all valid hourly averages occurring within each calendar month. The first 12 month period shall commence on January 1, 2006.No changes other than numeration from b to c .

d. *(Previously c) Valid Hourly Average*: No changes besides numeration.

e. *(Previously d) Data Availability*: During each semiannual (six-month) period, CEM system valid hourly averages shall be obtained for at least ~~90~~ 95 percent of the operating hours for which the plant is producing clinker. If the CEM system does not obtain valid hourly averages for 90 percent or more of the operating hours per semiannual period for which the

plant is producing clinker, the permittee shall also submit a continuous monitoring system performance report with the semiannual excess emissions ~~and continuous monitoring system performance~~ report. This report must include corrective actions, and it shall be submitted within 30 days following the end of each semiannual reporting period.

f. *(Previously e) Compliance Assurance*: CEM system breakdowns, malfunctions, repairs, calibration checks, zero adjustments, and span adjustments all result in periods during which CEM system data are not obtained. During such periods in excess of ~~120 hours~~ five percent of the total operating hours per calendar quarter, the permittee shall assure compliance with the emissions standards of this permit through stack tests, alternative monitoring systems, or other methods as approved by the Department.

SPECIFIC CONDITION NO. 16

Material Balance Records of Mercury

Titan states: It should be noted that pursuant to the federal Clean Air Act (section 112(d)(1)), mercury and lead were delisted from the federal NSR program. Accordingly, any exceedances of these values do not constitute a violation of federal NSR permitting requirements.

Testing conducted on October 22, 2004 resulted in mercury and lead emissions well below the annual emission thresholds for mercury and lead identified in this paragraph. Accordingly, DERM waives testing for mercury and lead until October 22, 2009.

The Department verbally discussed this matter with Titan's representative. The Department clarified that the Environmental Regulatory Commission has determined the Department would maintain mercury as a pollutant regulated by the Department's PSD Regulations at Paragraph 62-212.400, F.A.C.

The Department advised that a single stack test is not representative of mercury emissions because of: raw materials variations and alternating enrichment and intermittent alleviation via the stack of the external mercury cycle under raw mill on and off conditions.

The Department provided via electronic mail conditions from the most recent cement kiln permits in response to Titan's concern about being more burdened with this requirement than other plants.

Titan's representative requested that the materials samples be taken at the feed silo to the kiln, but it was pointed out that this location would overestimate mercury flow because of enrichment within the external cycle. The Department agreed to provide time to Titan to develop the internal protocols to collect, homogenize, store and test raw material and fuel samples.

Titan requested to develop in the future a method to integrate these determinations into present plant sample collection procedures or conceivably develop a different method to accurately determine mercury emissions. The procedures may be developed soon enough to incorporate into the Title V Operation Permit presently under review. No changes will be made to the condition at this time except to allow commencement of the sampling program after development of the necessary protocols and by July 1, 2006.

The following language is appended to Specific Condition 16:

The first 12-month rolling period shall begin on July 1, 2006.

SPECIFIC CONDITION NO. 3, 8, 21, 24, and 28

Visible Emission Limits

Titan proposed to modify Specific Conditions No. 21, 24 and 28 by adding the 40 CFR 63, Subpart LLL language to these visible emissions conditions as follows:

(4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

(i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

(ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9.

This language is an applicable requirement and it was already included within the Appendix LLL of the draft permit pursuant to Section 40 CFR 63.1350 (a)(4)(*i*), (*ii*), (*iii*) and (*iv*). Department agrees to duplicate the language in Specific Conditions 21, 24 and 28 at the request of Titan as well as in 3 and 8 that have the identical reference to Permit Appendix LLL. The following sentence that was left out of Titan's description of (4)(iv) above will be added as well:

"....with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions."

SPECIFIC CONDITION NO. 31

Coal Handling System

Titan commented (that directly under the table): it is stated that the opacity limit is 10%, below it states 5%. Is it 5% to 10%? Make sure it's consistent in terminology.

The Department clarifies that the limit for the common (main) stack is 10 % opacity. The limit of 5 % opacity is for all the other emission units at this Coal Handling System. No changes are required for this condition.

SPECIFIC CONDITION NO. 33

No comments were received regarding this condition. It is repeated here because of its relation to comments in the following sections.

33. Reasonable Precautions for Emissions of Unconfined Particulate Matter: This facility is subject to applicable requirements of Rule 62-296.320(4)(c)1, 2, 3, & 4, F.A.C. Refer to Appendix C: Common Conditions.

APPENDIX C, COMMON CONDITIONS, CONDITION NO. 11

No comments were received regarding this condition. It is the reference to Specific Condition 33 and rationale for Specific Conditions 34, 35, and Appendix D. It is repeated here because of its relation to the mentioned specific conditions.

11. Unconfined Emissions of Particulate Matter:

(1) No person shall cause, let, permit, suffer or allow the emissions of unconfined particulate matter from any activity, including vehicular movement; transportation of materials; construction, alteration, demolition or wrecking; or industrially related activities such as loading, unloading, storing or handling; without taking reasonable precautions to prevent such emissions.

(2) Any permit issued to a facility with emissions of unconfined particulate matter shall specify the reasonable precautions to be taken by that facility to control the emissions of unconfined particulate matter.

(3) Reasonable precautions include the following:

a. Paving and maintenance of roads, parking areas and yards.

b. Application of water or chemicals to control emissions from such activities as demolition of buildings, grading roads, construction, and land clearing.

c. Application of asphalt, water, chemicals or other dust suppressants to unpaved roads, yards, open stock piles and similar activities.

d. Removal of particulate matter from roads and other paved areas under the control of the owner or operator of the facility to prevent reentrainment, and from buildings or work areas to prevent particulate from becoming airborne.

e. Landscaping or planting of vegetation.

f. Use of hoods, fans, filters, and similar equipment to contain, capture and/or vent particulate matter.

g. Confining abrasive blasting where possible.

h. Enclosure or covering of conveyor systems.

Additional reasonable precautions applicable to this facility are included in Section III of the Permit under Subsection: Cement Plant Fugitives Emissions and Appendix D: Fugitive Dust Improvement Plan.

(4) In determining what constitutes reasonable precautions for a particular source, the Department shall consider the cost of the control technique or work practice, the environmental impacts of the technique or practice, and the degree of reduction of emissions expected from a particular technique or practice.

[Rule 62-296.320(4)(c), F.A.C.]

SPECIFIC CONDITION NO. 35

No comments were received regarding this condition. It is repeated here because of its relation to comments in the following sections.

35. Fugitive Dust Improvement Plan: The owner or operator shall implement the Fugitive Dust Improvement Plan attached as Appendix D. The permittee shall submit quarterly progress reports to include a status report on each specific action implemented under Appendix D (part of the permit). The first quarterly report shall be submitted in January 2006, with updates every 3 months thereafter for a two-year period. The progress reports shall be submitted to the Compliance Authority (Miami-Dade County DERM).

SPECIFIC CONDITION 34 - ADDITIONAL REASONABLE PRECAUTIONS FOR EMISSIONS OF UNCONFINED PARTICULATE MATTER

Personnel

Titan's comment on 34.a: Define all plant operators? Does this mean all heavy equipment operators, all tanker drivers, all train operators? Is this strictly in the aggregate part of the plant or does it include the block and ready mix? The block and read-mix already water their stock piles continually but the pile in the aggregate facility is a little harder because the more you water them the more muck coming out of the trucks leaving the facility.

Titan subsequently recommended the following replacement language: Train all aggregate and material handling personal on visible emissions and standard operating procedures for controlling fugitive emission.

DERM recommended the following replacement language: The facility shall develop and implement a facility-wide Fugitive Dust Response Plan by March of 2006. All plant operators must be trained in visible emissions and in the facilities Fugitive Dust Response Plan and shall perform visual inspections of on-site roadways and stockpiled materials regularly and before handling. If the visual inspections indicate fugitive emissions, the observer must implement the facilities response plan.

The Department notes that there was little evidence of fugitive dust control under the old wet process operation. The superior process dust control equipment and the Fugitive Dust Improvement Plan implemented at the new dry process operation provide reasonable assurance that the project nets out of PSD for PM/PM_{10}. Condition 34.a is modified as follows:

a. ~~All plant operators shall be trained in the facilities basic environmental compliance and shall perform visual inspections of stockpiled materials, coal and petroleum coke regularly and before handling. If the visual inspections indicate a lack of surface moisture, the materials, coal and petroleum coke shall be wetted with sprinklers. Such wetting shall continue until the potential for unconfined particulate matter emissions are minimized.~~

Aggregate and material handling personnel, their supervisors, and environmental personnel, shall be trained in visible emissions, permit conditions related to fugitive emissions, and the Best Management Practices developed by Titan to implement the Fugitive Dust Improvement Plan under Appendix D.

Condition 34 b. No comments were initially received about this condition. Titan subsequently submitted recommended changes below.

The Department agrees with Titan's recommendation. A speed limit of 5 miles per hour (mph) is difficult to discern and enforce. The training including the identification of the patterns to personnel assigned to these tasks will likely be more productive. For example, there will be specific patterns to cover the entrance to the cement plant, the ready-mix plant, and the block plant. Condition 34.u. related to water trucks is consolidated with this condition. The condition is modified as follows:

~~b. To effectively control dust by road sweepers, provide operators training on proper operation. Proper operation includes going slow (5 mph or less) and having the water nozzles effectively controlling dust when sweeping roads. (No change).~~

Personnel shall be trained on proper operation of wet-dry sweeper and water trucks. Training shall include but not be limited to speed, nozzle operation, and cleaning patterns around the plants that comprise the facility.

Roads

Titan's comment 34.c.: The speed limit through the plant is now 19.5 mph or less. Trying to enforce a 5 to 10 mile hour speed limit would be almost impossible. Can we just keep it the way it is and maybe add some speed humps at problem locations?

Titan subsequently submitted the following replacement language:

Maintain current speed limit of 19.5 mph and communicate to all outside hauling companies the importance of controlling visible emissions within the facility property boundaries.

DERM and the Department agree with Titan. Titan pointed out that the large quarry trucks that deliver material to the crusher are physically limited in maximum speed capability to insure adherence to the 19.5 mph speed limit. DERM recommended the following acceptable replacement language. Additional Department language is shown as double-underline.

c. ~~Reduce speed limit (5 to 10 mph) on the unpaved haul roads to ensure effective reduction of emissions from trucks~~.

Identify areas where the installation of speed bumps would be beneficial in reducing vehicular speed and fugitive emissions. Install the additional speed bumps by June 30, 2006.

d. Clean and maintain paved road surfaces, which includes removing silt build-up, repairing all potholes, sweeping on a daily basis and utilizing a water truck to control visible emissions.

Titan's comment 34.e.: The manufacturing area is paved and the block areas are paved areas. Which raw material road are you (Department) referring to? The one that goes from the aggregate plant to the quarry?

DERM recommended paving of the raw material road from the aggregate plant to the raw material storage area. In subsequent discussions, Titan pointed out that they have paved the previously unpaved finish mill area. The entire block plant and ready-mix plant are paved. They will construct a new entrance road as described in the Fugitive Dust Improvement Plan and pave the lime rock road from the pack house to the new entrance.

Titan claimed that it is not feasible to pave the mentioned raw material road actually large swath or path. There are large material piles along the path and a lot of material handling equipment working these areas. According to the Fugitive Dust Improvement Plan, sprinkler system shall be installed along the main haul road from the quarry to the Aggregate Plant. This will reduce fugitive PM emissions from this unpaved road.

A new entrance road will be constructed by extending 106th Avenue north along the east side of the property, just east of the old ESPs. This road improvement will be implemented in cooperation with the City of Medley. Once the entrance road is completed, the lime rock road from the pack house to 106th Avenue will be paved. This will reduce truck traffic on the Main plant entrance road (off U.S. 27), and will reduce fugitive emissions from unpaved roads.

On balance, the Department believes that the project still nets out of PSD for PM/PM_{10}. Sufficient reasonable precautions are proposed without paving the mentioned road. This matter can be reviewed as a possible reasonable precaution in the future after observing the success of the other measures described in this permit. The condition will be changed as follows:

e. Pave the manufacturing areas in the cement plant, the block area, the ready-mix plant, ~~raw materials roads~~ and the access roadways for the facility with asphalt or concrete.

f. Maintain dedicated berm areas that have been established throughout the facility to further reduce wind erosion from ground areas.

Condition 34 g. No comment was received from Titan about this condition.

DERM recommended to the Department that the condition be removed. Presumably this recommendation was in conjunction with the paving of the same area recommended by DERM. Since the paving of this area will not be required at this time, the condition requiring the installation of the sprinkler system along the same path will be preserved.

g. Install a sprinkler system to reduce dust along the aggregate road between the pits and the storage building.

Titan's comment 34.h.: The area directly to the south of the entrance and the railroad track is not owned nor operated by Titan but the side to the north is owned by Titan and is an area utilized by trucks who cannot get into the facility for one reason or another but they are not blocking the entrance nor sitting out by the highway. Titan will agree to establishing more green areas within the facility but would prefer to not change that area at this time.

Titan subsequently proposed replacement language that was accepted by the Department.

The Department notes that there will be improvements to 102nd Road and 106th Avenue. On balance this represents an improvement consistent with netting out of PSD for PM/PM_{10}. The possible improvements along the main entrance can be reviewed as possible reasonable precautions in the future after observing the success of the other measures described in this permit. The condition will be changed as follows:

h. ~~Improve the main entrance to the plant by establishing green areas between the railroad tracks and the security gate. Refer to Appendix D: Facility Fugitives Emissions Control.~~

Improve the main entrance by establishing green areas between the security gate and the main facilities.

Materials

Titan's comment 34.i.: It is impossible for Titan to store all raw and fuel material indoors. If forced to store all materials inside then production and employment will change because we will not be able to operate without significant material on the ground ready to move at any time. Titan will develop and train front loader operators that move said material in best management practices. Subsequently, Titan pointed out they no longer generate and no longer need to store additional very fine cement kiln dust outdoors.

The Department notes that prior to the modernization and the construction of an 8-acre materials storage building, virtually all material was stored outdoors. According to Titan, at least 80% of raw materials used by the cement plant is stored indoors. Although the Department does not believe "it is impossible to store all raw materials indoors", the Department believes that even with deletion of the condition, the project will still net out of PSD. This condition is modified as follows:

i. ~~Store raw materials and fuels in a storage building, and move primarily by stacker/reclaimer and covered conveyor belts.~~

To the extent feasible, raw materials and fuels for the cement facility will be storage inside the raw material building. All material within the raw material building will be moved by stacker/reclaimer and covered conveyor belts.

Titan's comment 34.j.: Installing water spray bars sounds in the "perfect" world great, but the increase in fuels because of the moisture content of the material will increase not only emissions but production costs. Spray bars on other areas of the conveyor systems present their own set of problems like material clumping together and clogging other pieces of equipment, etc.

Titan subsequently proposed the language below as an additional permit condition to replace 34.j.

The Department accepts Titan's arguments and believes there are still sufficient reasonable precautions to net out of PSD. The recommended replacement condition is acceptable.

j. ~~Install water spray bars at each unenclosed material and fuel conveyor. The spray bars shall be used to wet the materials and fuel if inherent moisture and moisture from wetting the storage piles are not sufficient to prevent unconfined particulate matter emissions.~~

All conveyors are to be enclosed on at least three sides.

Titan's comment 34.k.: Again, it creates more problem than decreasing any type of fugitive emissions.

The Department agrees with Titan comments. This condition is deleted.

~~k. Install water supply lines, hoses and sprinklers near all stockpiled materials, coal and petroleum coke stockpiles.~~

Titan's comment 34.l.: Again we are an aggregate facility and requesting that we store all materials under roof is impossible.

The Department believes that storage of over 80% of the cement process raw materials indoors is a substantial improvement over the previous practices and provides sufficient assurance that the project nets out of PSD. The condition will be removed.

~~l. Store all materials, coal and petroleum coke at the plant under roof on compacted clay or concrete, or in enclosed vessels.~~

Titan's comment 34.m.: Where do you want us to increase this storage area at?

The Department agrees there is sufficient covered storage area given the substantial increase over the minimal storage under wet process operation. The condition will be removed.

~~m. Increase storage area for coal handling to accommodate additional inventory.~~

Condition 34 n. No comment was initially received about this condition. Titan subsequently submitted the replacement language below.

The Department does not regulate indoor air. However, material that collects on interior walls and other surfaces (e.g. in the finish mill building) has been observed to contribute to visible emissions from open buildings. The additional language regarding the clinker production area is acceptable. The Department will clarify that the concern is visible emissions outdoors. The condition is modified as follows:

~~n. Implement a cleaning process inside buildings to minimize dust.~~

k. The facility shall continue to maintain the clinker production area and continue to implement a cleaning process inside buildings to minimize dust emitted to the outside environment.

~~o.~~ l. Unloading and reclaiming of materials will be curtailed during windy or dry conditions.

~~p.~~ m. Raw materials will be managed to minimize their time in storage.

Trucks

Condition 34 q. No comment was initially received about this condition. Titan subsequently submitted the replacement language below. In subsequent discussions, Titan requested not to require bulk transport trucks to use a wheel wash. Their contention is that bulk transport trucks are restricted solely to roads that are paved. Further they have closed other roads entering and leaving the facility thus insuring that these vehicles stay on paved roads. They also stated that there are three vehicle wash stations used by the bulk transport vehicles.

The Department agrees, given that the manufacturing areas and roads used by the bulk transport trucks have been paved. The condition is modified as follows:

~~q. Install a wheel wash system and a dewatering area at the unpaved aggregate plant entrance/exit. In addition, install sufficient wheel wash system(s) at the facility entrance/exit to ensure bulk transport trucks leaving the plant shall travel through a wheel wash that removes particulate matter from vehicle tires, before traveling on the facility's access roadways.~~

n. All trucks leaving the aggregate facility will be required to dewater and drive through the tire wash system.

Titan's comment 34.r.: Titan does not own the trucks leaving the facility and most of the trucks leaving are owned by individual companies and people. Titan can recommend that all trucks leaving the facility tarp their loads. But if the FDOT and local regulations cannot get trucks to comply with the regulations how can Titan enforce such regulations?

In subsequent discussions, Titan's representative stated that the company has riders in its contracts with transportation companies requiring adherence to the environmental regulations including the tarpaulin requirement. Titan stated they are sending memoranda reminding the companies of the requirement to comply with the tarpaulin requirement. Titan recommended the replacement language below.

This condition is modified as follows:

~~r. Cover and secure transport trucks entering and leaving the facility with tarpaulins to prevent spillage. Advise drivers and companies of need to continue compliance outside of the facility.~~

o. Titan America/Tarmac will work with all transport companies to further educate drivers in the Florida Department of Transportation requirements that all loads be tarped prior to leaving the facility.

Conditions 34 s and t.: No comments were initially received from Titan about these conditions. Subsequently DERM and Titan submitted similar language consolidating these two conditions.

The conditions are modified and consolidated as follows:

~~s. Keep trucks on concrete surfaces within the loadout and the Cement Packhouse part of the facility.~~

~~t. Use concrete or asphalt paved roads.~~

p. All trucks traveling within the cement facility should stay on asphalt or concrete surfaces. All road surfaces outside of the aggregate facility shall be constructed of concrete and/or asphalt.

Conditions 34 u.: No comments were initially received from Titan about this condition. Subsequently, Titan recommended consolidation of this condition with Condition 34.b. above.

This condition is deleted. Refer to Condition 34.b.

~~u. Use watering trucks (facility should have at least 2) and road's vacuum sweepers to serve the entire facility.~~

CONCLUSION

The final action of the Department is to issue the permit with the changes noted above.

Department of Environmental Protection

Jeb Bush
Governor

Twin Towers Office Building
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

Colleen M. Castille
Secretary

PERMITTEE:

Tarmac America, LLC.
455 Fairway Drive
Deerfield Beach, Florida 33441

Permit No.	0250020-017-AC (PSD-FL-360)
Project:	Production Increase
SIC:	3241 Cement, Hydraulic
Expires:	April 30, 2006

Authorized Representative:
Hardy Johnson, President
Tarmac America LLC

PROJECT AND LOCATION:

The project is a production increase from 1,642,500 tons per year (TPY) to 2,190,000 TPY of clinker at the recently modernized dry process Titan Florida Pennsuco Cement Plant in Medley Florida. The project involves no additional physical modifications and involves removal of annual production restrictions and limitations on hours of operation on a number of emissions units.

This permit is issued pursuant to the Rules for the Prevention of Significant Deterioration (PSD). It authorizes the production increase, the various changes in hours of operation, and final emission limits including best available control technology (BACT) for carbon monoxide (CO). This permit includes certain provisions from the previous permits related to the modernization project as revised by the present project. It reflects the final as-built configuration, production limits, emissions limits, shut down of the wet process lines, applicable rules, compliance assurance provisions, etc.

The Titan Florida Pennsuco Cement Plant is located at 11000 NW 121 Way, Medley, Miami-Dade County. UTM coordinates are Zone 17; 562.8 km E; 2861.7 km N.

STATEMENT OF BASIS:

This air construction permit is issued under the provisions of Chapter 403 of the Florida Statutes (F.S.), and Chapters 62-4, 62-204, 62-210, 62-212, 62-296 and 62-297 of the Florida Administrative Code (F.A.C.). The above named permittee is authorized to construct/operate the facility in accordance with the conditions of this permit and as described in the application, approved drawings, plans, and other documents on file with the Department of Environmental Protection (Department).

Attached appendices and documents made a part of this permit:

Appendices A through I	Section IV of Permit – Table of Content, Appendices

Michael G. Cooke, Director
Division of Air Resource
Management

FACILITY DESCRIPTION

Tarmac America LLC operates the Titan Florida Pennsuco facility in Medley, Miami-Dade County. The facility consists of:

- A 10,000,000 tons per year (TPY) on-site limestone quarry that supplies approximately 3,000,000 TPY to the adjacent cement plant and the remainder to other users;
- A dry process portland cement plant that consumes up to 3,723,000 TPY of limestone and mineral aggregate and is permitted to produce no more than 2,190,000 TPY of clinker and approximately 2,400,000 TPY of portland cement;
- A ready-mix concrete plant; and
- An 85,000 block per day grey concrete block plant.

CEMENT PLANT DESCRIPTION

This permit relates to the dry process portland cement plant which, by this permit is permitted to increase annual production from 1,642,500 TPY to 2,190,000 TPY of clinker. Modernization of the plant included startup of the dry pyroprocessing line in 2004 and shutdown of the two wet process lines in the same year. The portland cement plant includes the following main components:

- An 8-acre, 95-foot high "A-frame" raw materials storage building (MSB);
- Raw material and fuel piles stored outside and inside of the MSB. The piles consist of blended limestone, alumina source (e.g. bauxite), iron source (e.g. mill scale), high lime limestone, coal, and petroleum coke;
- Materials handling equipment including bridge reclaimers, stackers, belt conveyors, conveyor from the MSB to the raw mill, control system/analyzer, etc.;
- An F.L. Smidth nominal 400 dry tons per hour (TPH) Model 52/4 Raw mill and F.L. Smidth nominal 15,000 ton blending silo;
- An F.L. Smidth Rotax kiln that is 65 meters long and 5 meters in diameter;
- An F.L. Smidth 5-stage "Low NO_X" in-line calciner (ILC) with sequenced fuel and air introduction and meal staging;
- An F.L. Smidth 4x5 cross bar clinker cooler;
- An F.L. Smidth Airtec ten-compartment baghouse with 690 bags per compartment;
- An F.L. Smidth nominal 35 TPH coal (and petroleum coke) mill;
- Four finish mills including a new F.L. Smidth finish mill consisting of four ball mills; and
- Cement storage, truck/rail loadout and packhouse.

RELEVANT DOCUMENTS

The construction permit application 0250020-017-AC to increase annual production was received on April 18, 2005. It was revised and made complete by a submittal dated September 30, 2005 requesting issuance of the permit pursuant to the PSD Rules at Paragraph 62-212.400, F.A.C.

The documents listed below are not part of this permit; however, they are specifically related to the modernization project and to the present permitting action:

- Construction Permit 0250020-008-AC issued October 21, 1999.
- Construction Permit 0250020-010-AC issued May 1, 2001.
- Construction Permit 0250020-016-AC issued May 31, 2005.

EMISSIONS UNITS

This permit addresses the following Emissions Units at the portland cement plant:

ARMS Emission Unit No.	EMISSION UNIT DESCRIPTION
010	Finish Mill No. 1
012	Finish Mill No. 3
013	Finish Mill No. 4
030	Finish Mill No. 6
014	Cement Storage Silos 1 through 12
015	Cement Distribution, Rail and Truck Loadout
016	Cement Packhouse
026	Coal Handling System
027	Clinker Handling and Storage
028	Raw Mill and Pyroprocessing System
029	Raw Material Handling
031	Fugitive Emissions – Transportation, Miscellaneous Transfers, Storage

REGULATORY CLASSIFICATION

Title III: The Department has determined that the facility is a major source of hazardous air pollutants (HAP).

Title V: This facility is classified as a Major or Title V Source of air pollution because emissions of at least one regulated air pollutant, such as particulate matter (PM/PM_{10}), sulfur dioxide (SO_2), nitrogen oxides (NO_X), carbon monoxide (CO), or volatile organic compounds (VOC) exceeds 100 TPY.

PSD: This facility is within an industry included in the list of the 28 Major Facility Categories per Table 212.400-1, F.A.C. Because emissions are greater than 100 TPY for at least one criteria pollutant, the facility is also a Major Facility with respect to Rule 62-212.400, F.A.C., Prevention of Significant Deterioration (PSD). The proposed project is subject to PSD because annual CO emissions will increase by an amount greater than the significant emission rate of 100 TPY given in Table 212.400-2.

NSPS: This facility operates units that were originally subject to the following New Source Performance Standards in 40 CFR 60 adopted and incorporated by reference in Rule 62-204.800, F.A.C.: Subpart A (General Provisions); Subpart F (Portland Cement Plants); Subpart Y (Coal Preparation Plants); and Subpart OOO (Nonmetallic Mineral Processing Plants). Pursuant to 40 CFR 63.1356(a), any affected source subject to the major source provisions of Subpart LLL is exempted from any otherwise applicable new source performance standard contained in 40 CFR 60, Subpart F or 40 CFR60, Subpart OOO.

NESHAP: This facility operates units subject to the following National Emission Standards for Hazardous Air Pollutants in 40 CFR 63 adopted and incorporated by reference in Rule 62-204.800, F.A.C.: Subpart A (General Provisions); and Subpart LLL (Portland Cement Manufacturing Industry).

GENERAL AND ADMINISTRATIVE REQUIREMENTS

1. Permitting Authority: The Permitting Authority for this project is the Florida Department of Environmental Protection's Bureau of Air Regulation located at 2600 Blair Stone Road, MS #5505, Tallahassee, Florida 32399-2400 and phone number 850/488-0114.

2. Compliance Authority: All documents related to compliance activities such as reports, tests, and notifications should be submitted to: Air Quality Management Division, Miami-Dade County Department of Environmental Resources Management, 33 Southwest Second Avenue, Suite 900, Miami, Florida 33130-1540. Copies shall also be submitted to: Air Resource Section, Southeast District Office, Florida Department of Environmental Protection, 400 North Congress Avenue, West Palm Beach, Florida 33401 (Telephone: 561/681-6600).

3. General Conditions: The owner and operator are subject to, and shall operate under the attached General Conditions listed in *Appendix GC* of this permit. General Conditions are binding and enforceable pursuant to Chapter 403, F.S. [Rule 62-4.160, F.A.C.]

4. Applicable Regulations, Forms and Application Procedures: Unless otherwise indicated in this permit, the construction and operation of this project shall be in accordance with the capacities and specifications stated in the application. The facility is subject to all applicable provisions of: Chapter 24- Code of Miami-Dade-County, Chapter 403, F.S.; Chapters 62-4, 62-204, 62-210, 62-212, 62-213, 62-296, and 62-297, F.A.C.; 40 CFR 60; and 40 CFR 63. The permittee shall use the applicable forms listed in Rule 62-210.900, F.A.C. and follow the application procedures in Chapter 62-4, F.A.C. Issuance of this permit does not relieve the facility owner or operator from compliance with any applicable federal, state, or local permitting or regulations.
[Rules 62-204.800, 62-210.300 and 62-210.900, F.A.C.]

5. Permit Expiration: For good cause, the permittee may request that this air construction permit be extended. Such a request shall be submitted to the Department's Bureau of Air Regulation at least sixty (60) days prior to the expiration of this permit.
[Rules 62-4.070(4), 62-4.080, and 62-210.300(1), F.A.C.]

6. Completion of Construction: Construction on the modernized cement plant is essentially complete and the new pyroprocessing line has already been tested for compliance with the conditions of the previous air construction permit. On-going construction activities include completion of a new mill and on-going fugitive emissions projects. The permit expiration date is April 30, 2006 and will allow operation of the plant while the Department of Environmental Protection processes the Title V Operation Renewal Permit.

7. New or Additional Conditions: For good cause shown and after notice and an administrative hearing, if requested, the Department may require the permittee to conform to new or additional conditions. The Department shall allow the permittee a reasonable time to conform to the new or additional conditions, and on application of the permittee, the Department may grant additional time.
[Rule 62-4.080, F.A.C.]

8. Modifications: No emissions unit or facility subject to this permit shall be constructed or modified without obtaining an air construction permit from the Department. Such permit shall be obtained prior to beginning construction or modification. [Rules 62-210.300(1) and 62-212.300(1)(a), F.A.C.]

9. Title V Permit: This permit authorizes construction/modification of the permitted emissions units and initial operation to determine compliance with Department rules. A Title V operation permit is required for regular operation of the permitted emissions unit. The permittee applied for a Title V Operation Permit Renewal that anticipated the present air construction permit.
[Rules 62-4.030, 62-4.050, 62-4.220, and Chapter 62-213, F.A.C.]

CEMENT PLANT RAW MATERIAL HANDLING SYSTEM

This system addresses the following emissions unit.

ARMS E.U. No.	DESCRIPTION
029	Raw Material Handling Operations

The raw material handling operations are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I.D. 311.BF650	Dust collector for limestone and mineral aggregate feed bins/conveying
Baghouse I.D. 311.BF750	Dust collector for raw material conveyance from feed bins to raw mill
Baghouse I.D. 311.BF470	Dust collector for raw material conveyance from feed bins to raw mill
Baghouse I.D. 311.BF950	Dust collector for raw material conveyance from feed bins to raw mill

Operational Requirements

1. Hours of Operation: This emissions unit system is allowed to operate 8,760 hours per year. [Application received April 18, 2005]

2. Raw Material Handling System Throughput Specification: The maximum dry throughput rate is 3,723,000 TPY. The owner or operator shall record all throughput rates on a rolling 12-month basis, and maintain records for a minimum of 5 years. [Application received April 18, 2005; Permit 0250020-016-AC; Rules 62-4.070(3); and 62-213.440, F.A.C.]

Emissions Limitations and Performance Standards

3. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses. Compliance shall be determined in the manner described in 40 CFR 63.1350(a)(4)(i), (ii), (iii) and (iv) below except that the applicable standard is 5% instead of 10%.

   (4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

   (i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

   (ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

   (iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.0095 grains/dry standard cubic foot (gr/dscf). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points in this emission unit system will be less than 13 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 63, Subpart LLL.}

[Rules 62-4.070(3), 62-212.400, F.A.C. and 40 CFR 63.1348]

4. Raw Mill Monitoring: The owner or operator of a raw mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCDs (PM control devices) of these affected sources, in accordance with the procedures of Method 22 of Appendix A, 40 CFR Part 60 and as required by 40 CFR63.1350(e), Subpart LLL.

Pursuant to 40 CFR 63.1350(e):

The owner or operator of a raw mill or finish mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCDs of these affected sources, in accordance with the procedures of Method 22 of Appendix A of Part 60 of this chapter. The Method 22 test shall be conducted while the affected source is operating at the highest load or capacity level reasonably expected to occur within the day. The duration of the Method 22 test shall be six minutes. If visible emissions are observed during any Method 22 visible emissions test, the owner or operator must:

(1) Initiate, within one-hour, the corrective actions specified in the site specific operating and maintenance plan developed in accordance with paragraphs (a)(1) and (a)(2) of this section; and

(2) Within 24 hours of the end of the Method 22 test in which visible emissions were observed, conduct a visual opacity test of each stack from which visible emissions were observed in accordance with Method 9. The duration of the Method 9 test shall be thirty minutes.

[Rules 62-4.070(3) and 40 CFR 63.1350, Monitoring Requirements]

CEMENT PLANT PYROPROCESSING AND RAW MILL SYSTEM

This system addresses the following emissions unit.

ARMS E.U. No.	DESCRIPTION
026	Pyroprocessing and Raw Mill System Operations

The pyroprocessing and raw mill system are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I.D: 331.BF200	Main Stack & dust collector for preheater/kiln/cooler/raw mill/coal mill
Baghouse I.D: 331.BF740	Dust collector for kiln dust conveyance and storage bin
Baghouse I.D: 341.BF350	Dust collector for preheater feed silo
Baghouse I.D: 351.BF440	Dust collector for raw meal conveyance from feed silo to preheater
Baghouse I.D: 351.BF470	Dust collector for raw meal conveyance from feed silo to preheater
Baghouse I.D: 331.BF645	Dust collector for truck loadout of kiln dust

Operational Requirements

5. Hours of Operation: This emissions unit system is allowed to operate 8760 hours per year. [Applicant request - application received April 18, 2005, Rule 62-210.200, F.A.C., Definitions – Potential to Emit (PTE)]

6. Pyroprocessing System Production Limits: The maximum production of clinker shall not exceed 250 TPH on a 24-hour block average and 2,190,000 TPY. [Rule 62-210.200, (Definitions – Potential to Emit), F.A.C.; Applicant request in application received April 18, 2005]

7. Fuels: Allowable fuels fired in the pyroprocessing/raw mill emission unit consist of natural gas, bituminous coal, petroleum coke, No. 2 fuel oil with used oil blend and No. 6 fuel oil with used oil blend. Fuel oil includes on-spec used oil (refer to definition in specific condition 15).

   {There is no heat input limitation. For reference, the design heat input capacities of the kiln burner and calciner burner are 290 million Btu per hour (mmBtu/hr) and 385 mmBtu/hr respectively. The clinker production limit effectively limits PTE.}

Emissions Limitations and Performance Standards

8. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses, except for the main stack baghouse, I.D.331.BF200. Compliance shall be determined in the manner described in 40 CFR 63.1350(a)(4)(i), (ii), (iii) and (iv) below except that the applicable standard is 5% instead of 10%.

   (4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

   (i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

(ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.0095 grains/dry standard cubic foot (gr/dscf). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points, except for the *main stack*, in this emission unit system will be less than 7 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 63, Subpart LLL}

9. Main Stack - Pyroprocessing/Raw Mill Emission Limits: Emissions exiting the main stack from the Pyroprocessing/Raw Mill system shall not exceed the limits shown in the following table:

PARAMETER	EMISSION LIMIT	AVERAGING TIME	COMPLIANCE METHOD	LIMIT BASIS
Opacity[6]	10 Percent	6 minute block	COMS, Method 9	PTE, Avoid PSD 40 CFR Subpart LLL
PM[6]	0.067 lb/ton of dry kiln feed	3 hours[5]	Annual Method 5	PTE, Avoid PSD 40 CFR Subpart LLL
	28.5 lb/hr			
PM_{10}[6]	0.056 lb/ton of dry kiln feed	3 hours[5]	Annual Method 5	PTE, Avoid PSD 40 CFR Subpart LLL
	23.9 lb/hr			
SO_2	0.50 lb/ton of clinker	30 days[2]	CEMS	PTE, Avoid PSD
	320 lb/hour	24 hours[1]		
NO_X (as NO_2)	2.17 lb/ton of clinker	12-months[3]	CEMS	PTE, Avoid PSD
	720 lb/hour	24 hours[1]		
CO	2.0 lb/ton of clinker	30 days[2]	CEMS	BACT
	576 lb/hour [1]	24 hours[1]		
VOC[4]	0.16 lb/ton of clinker [2]	30 days[2]	CEMS	PTE, Avoid PSD
	40 lb/hour	24 hours[1]		
Mercury (Hg)	229 lb/yr (base + 199 lb/yr)	12-month	Fuels, Materials[8]	PTE, Avoid PSD
Temperature[7]	Baghouse Temperature (T) ≤ T during Dioxin/Furan Tests	Continuous		40 CFR 63, Subpart LLL
Dioxin/Furan	0.2 ng TEQ/dscm (T≥204 °C)	3 hours	30 Months, Method 23	40 CFR 63, Subpart LLL
	0.4 ng TEQ/dscm (T<204 °C)			

1 Compliance with the short-term emission limit for SO_2, NO_X, CO, and VOC shall be based on a 24-hour block average computed in accordance with Specific Condition 14. Compliance with lb/hr SO_2 emissions limitations in this condition will insure compliance with Miami-Dade County Code, Section 24-17(2)(a) limiting emissions to 1.2 lb SO_2/MMBtu heat input when solid fuel is fired, or 0.8 lb SO_2/MMBtu heat input when liquid fuel is fired, based on a 24 hour average

2 Compliance with the long-term emission limit for SO_2, CO, and VOC shall be based on a 30 operating-day block average computed in accordance with Specific Condition 14.

3 Compliance with the long-term emission limit for NO_X shall be based on 12 month rolling average computed in accordance with Specific Condition 14.

4 VOC emissions shall be expressed as propane.

5 The averaging times for PM and PM_{10} correspond to the required length of sampling for the initial and subsequent emission tests. Compliance demonstration with these limits shall be conducted pursuant to 40 CFR 63.1349(b)(1).

6 Compliance with the Opacity, PM and PM_{10} permit limits given for in-line kiln/raw mill will insure compliance with applicable limits from 40 CFR 63, Subpart LLL for the in-line kiln/raw mill, and clinker cooler, and 40 CFR 60, Subpart Y for the coal mill.

7 The temperature requirements for the operation of in-line kiln/raw mill are in accordance with 40 CFR 63.1344(a) & (b), and 63.1349(b)(3)(iv).

8 Determined by raw materials and fuels entering the process. Refer to Condition 10.

[Applicant BACT information for CO and request to escape PSD for other criteria pollutants; Rules 62-4.070(3) and 62-212.400, F.A.C.; 40 CFR 63.1343 and 63.1345; Application received April 18, 2005 and revised September 30, 2005].

{Permitting Note: For compliance with the long term CO, NO_X, SO2, and VOC limits (30-day block and 12-month rolling averages), the averaging periods shall begin January 1, 2006.}

10. Mercury Emissions from the Pyroprocessing/Raw Mill System: Mercury emissions exiting the main stack from the Pyroprocessing/Raw Mill system shall not exceed 229 pounds per year on a 12-month rolling basis. Mercury

[Rules 62-4.070(3) and 62-210.200, F.A.C. (definitions – Potential to Emit), Avoid PSD]

Test Methods, Monitoring and Procedures

11. Determination of Clinker Production Rate during Testing: Prior to any emission testing to demonstrate compliance with any emission limit, the permittee shall determine the clinker production rate for the test according to the equation in Specific Condition 18. The permittee shall notify the DERM of the preheater kiln feed rate and the factor used to determine the clinker production rate in advance of the commencement of any test(s). The rate of clinker production shall be used to determine compliance with all clinker-based emission limits in the permit for that test. [DERM Requirement. Rule 62-4.070(3), F.A.C.]

12. Testing Procedures and Methods: In addition to the CEMS or COMS compliance requirements listed in Condition 10, the main stack & dust collector, Baghouse I.D. 331.BF200, serving the preheater/kiln/cooler/raw mill/coal mill shall be tested according to the EPA Methods and at the frequencies listed below:

POLLUTANT	TEST METHOD	FREQUENCY
PM/PM_{10}	5	Annual
Opacity	9	Annual
SO_2	6 or 6C	Annual [1]
NO_X (as NO_2)	7 or 7E	Annual [1]
CO	10	Annual [1]
VOC	25 or 25A	Annual [1]
Dioxins/Furans	23	30 months

1. The tests conducted annually for the relative accuracy test audit (RATA) for the CEM system may be used to satisfy this requirement provided the owner or operator satisfies the prior notification requirements and emission testing requirements of this permit for performance and compliance tests. The result from the actual referenced method (RM) test during the RATA needs to show compliance with the allowable permit emission limit.

[Rules 62-4.070(3), 62-297.310(7), and 62-212.400, F.A.C.; Permit 0250020-016-AC]

13. Feed or Fuel Changes and D/F Performance Testing: The owner or operator shall notify the compliance authority prior to initiating any significant change in the feed or fuel used in the most recent compliant performance test for D/F or PM. For purposes of this condition, significant means any of the following: a physical or chemical change in the feed or fuel; the use of a raw material not previously used; a change in the loss on ignition (LOI) characteristic of the fly ash; a change between non-beneficiated fly ash and beneficiated fly ash. Based on the information provided, the compliance authority will promptly determine if performance testing pursuant to 40 CFR 63.1349 will be required for the new feed or fuel. A significant change shall not include switching to a feed/fuel mix for which the permittee already tested in compliance with the dioxin/furan and PM emission limits. [62-4.070(3), F.A.C.]

14. Continuous Emission Monitoring Systems: The owner or operator shall install, calibrate, maintain, and operate continuous emission monitoring systems (CEMS) in the in-line kiln/raw mill stack to measure and record the emissions of NO_X, SO_2, CO, and VOC from the in-line kiln/raw mill, in a manner sufficient to demonstrate compliance with the emission limits of this permit. Alternatively, the CO monitor located in the downcomer (between the preheater and in-line raw mill) calibrated, maintained and operated as a CEMS may be used (in lieu of a CO CEMS located in the stack) to measure and record CO in a manner sufficient to demonstrate compliance with the emission limits for CO. The CEMS systems shall express the results in units of pounds per ton of clinker produced and pounds per hour. Emissions of VOC shall be reported in units of the standards (lb/hour, lb/ton clinker) and ppmvd as propane corrected to 7% oxygen.

    a. *Compliance Demonstration*: Compliance with the short-term emission limits for NO_X, SO_2, CO, and VOC shall be based on a 24-hour block average. The 24-hour block shall begin at midnight of each operating day and shall be calculated from 24 consecutive hourly average values. If there are less than 24 hours during the block, the 24-hr block average shall be the average of all valid hourly average values available during the 24 hour block. Compliance with the long-term emission limits for SO_2, CO, and VOC shall be based on a 30 operating-day block average that shall be computed as the arithmetic average of all valid hourly averages occurring within each 30 operating-day block. For purposes of the SO_2, CO, and VOC long-term emission limits, an operating day is any day that the kiln produces clinker or fires fuel. The first 30 operating day block shall begin the first operating day on or after January 1, 2006.

    b. *Compliance with the CO emission limits when using downcomer CO monitor*: Oxygen content must be measured at the location of the downcomer CO monitor. Data from the downcomer CO monitor shall be corrected to accurately reflect stack CO concentrations and to calculate mass emissions. The CO stack tests required when conducting a RATA or demonstrating initial or annual compliance shall be conducted in the in-line kiln/raw mill stack.

    c. *Compliance with the long-term NO_X emissions limit:* Compliance with the long-term NO_X emission limit shall be based on a 12 month rolling average that shall be recomputed each month as the arithmetic average of that month and the preceding 11 months. Each monthly average shall be computed by averaging all valid hourly averages occurring within each calendar month. The first 12 month period shall commence on January 1, 2006.

    d. *Valid Hourly Averages*: Each hourly average shall be computed as the arithmetic average of the data points generated by the CEM system. Data points must be generated at least once per minute. For an hourly average to be considered valid, at least two data points separated by a period of 15 minutes or more must be used to compute the hourly average.

        - Hours during which there is no preheater feed and no fuel fired to the kiln systems are not valid.
        - Hours during which the plant is firing fuel but producing no clinker are valid, but these hours are excluded from the production-normalized emission rate computation (pounds per ton of dry preheater feed or pounds per ton of clinker). These hours are included in any pollutant mass emission rate computation (pounds per hour).

    e. *Data Availability*: During each semiannual (six-month) period, CEM system valid hourly averages shall be obtained for at least 95 percent of the operating hours for which the plant is producing clinker. If the CEM system does not obtain valid hourly averages for 90 percent or more of the operating hours per semiannual period for which the plant is producing clinker, the permittee shall also submit a continuous monitoring system performance report with the semiannual excess emissions report. This report must include corrective actions, and it shall be submitted within 30 days following the end of each semiannual reporting period.

f. *Compliance Assurance*: CEM system breakdowns, malfunctions, repairs, calibration checks, zero adjustments, and span adjustments all result in periods during which CEM system data are not obtained. During such periods in excess of five percent of the total operating hours per calendar quarter, the permittee shall assure compliance with the emissions standards of this permit through stack tests, alternative monitoring systems, or other methods as approved by the Department.

15. Continuous Emissions Monitor System (CEMS) Requirements: All CEM systems shall be installed, operational, recording and continuously transmitting available data prior to the initial startup of the kiln and shall be certified within 60 days after achieving the maximum production rate at which the plant will be operated, but not later than 180 days after initial startup. The monitoring systems shall be certified in accordance with the appropriate Performance Specification in 40 CFR 60 Appendix B. The systems shall comply with the requirements for continuous monitoring systems found in the general provisions of 40 CFR 63, Subpart A including development of a quality control program. Data on monitoring equipment specifications, manufacturer, type calibration and maintenance requirements, and the proposed location of each monitor shall be provided to the DERM for review at least 45 days prior to replacement of any CEMS. [Rules 62-4.070 (3) and 62-204.800, F.A.C.]

16. Material Balance Records of Mercury: The owner or operator shall demonstrate compliance with the mercury throughput limitation by material balance and making and maintaining records of monthly and rolling 12-month mercury throughput. The owner or operator shall, for each month of sampling required by this condition, perform daily sampling of the raw mill feed, coal, petroleum coke, and fuel oil and shall composite the daily samples each month, and shall analyze the monthly composite sample to determine mercury content of these materials for the month. The owner or operator shall determine the mass of mercury introduced into the pyroprocessing system (in units of pounds per month) from the total of the product of the mercury content from the monthly composite analysis and the mass of each material or fuel used during the month. The consecutive 12-month record shall be determined from the individual monthly records for the current month and the preceding eleven months and shall be expressed in units of pounds of mercury per consecutive 12-month period. Such records shall be completed no later than 25 days following the month of the records. The first 12-month rolling period shall begin on July 1, 2006.

[Rule 62-4.070(3), F.A.C.]

On-Specification Used Fuel Oil

17. Limits and Test Methods Applicable to On-Spec Fuel Oil:

a. "Non-hazardous on-specification" used oil is defined as each used oil delivery that meets the 40 CFR 279 (Standards for the Management of Used Oil) specifications listed below. Used oil that does not meet all of the following specifications shall not be fired.

CONSTITUENT/PROPERTY	LIMIT	TEST METHOD [2]
Arsenic	5 ppm	EPA SW-846 (3040-7130)
Cadmium	2 ppm	EPA SW-846 (3040-7130)
Chromium	10 ppm	EPA SW-846 (3040-7130)
Lead	100 ppm	EPA SW-846 (3040-7130)
Total Halogens	<1000 ppm [1]	ASTM E442
PCBs	<50 ppm	ASTM D4059
Flash Point	100 °F (minimum)	ASTM D93

Sulfur	% by weight (informational)	ASTM D2622, D4294-90, or both D4057-88 & D129-91
Heat of Combustion	Btu/gal (informational)	ASTM D240-76
Density	Lb/gal (informational)	ASTM D1298-80

1. 40 CFR 279.10(b)(1) (ii) *Rebuttable presumption for used oil.* Used oil containing more than 1,000 ppm total halogens is presumed to be a hazardous waste because it has been mixed with halogenated hazardous waste listed in subpart D of 40 CFR part 261. Persons may rebut this presumption by demonstrating that the used oil does not contain hazardous waste (for example, by using an analytical method from SW–846, Edition III, to show that the used oil does not contain significant concentrations of halogenated hazardous constituents listed in appendix VIII of 40 CFR part 261). EPA Publication SW–846, Third Edition, is available from the Government Printing Office, Superintendent of Documents, P.O. Box 371954, Pittsburgh, PA 15250–7954, (202) 512–1800 (document number 955–001–00000–1"). If successfully rebutted for used oil up to 4000 ppm total halogens, used oil up to 4000 ppm maximum total halogens may be fired.

2. Other test methods may be used only after receiving written approval from the DERM.

b. *Analysis of used oil fuel.* The permittee may determine that the used oil to be burned for energy recovery meets the fuel specifications of §279.11 by performing analyses, or obtaining copies of analyses or other information, documenting that the used oil fuel meets the specifications.

c. *Record retention.* The permittee must keep copies of analyses of the used oil (or other information used to make the determination) for five years.

d. *Fuel Analysis for On-specification Used Oil Requirements.* Fuel analysis shall be in accordance with 40 CFR 266.43(b)(1) & (6). A sample shall be taken from the outlet of the blend tank on the first working day (i.e., Monday-Friday; exceptions: holidays) of each month, if any used oil was placed in the blend tank the previous month; or, the sample can be taken directly from the used oil mobile collection tank after final collection and prior to the time of initial transfer; but, that sampling frequency shall be no less than quarterly and the sampling methodology shall have been established with the DERM, Miami-Dade County prior to sampling. Upon taking a sample, the sample shall be analyzed for the following constituent/property and associated unit and using the following test methods (or their latest version):

e. *Submittal of Samples.* The results of each sample analysis (on the laboratory's letterhead) shall be submitted to the DERM within 30-days after the sample is taken and analyzed.

f. The results of each sample analysis (on the laboratory's letterhead) shall be submitted to the DERM within 30 days after a sample is taken and analyzed.

[DERM requirements. Rule 62-4.070(3), F.A.C., 40 CFR 279.11, which is adopted by reference in Rule 62-710.210(2), F.A.C., 40 CFR 279.72, 40 CFR 63.1343 and 63.1345, Application received April 18, 2005]

18. Used Oil Usage Records: In order to document compliance with the used oil limitations, the following requirements shall be adhered to as a minimum:

a. *Transfers to Storage Tank.* The dates and quantities of both on-specification used oil and purchased fuel oil transferred to the in-line kiln/raw mill's storage tank shall be reported quarterly (i.e., Jan.-Mar., April-June, July-Sept., and Oct.-Dec.) to the DERM and due during the month following the ending quarter.

b. *Recordkeeping.* When burning used oil, records shall be maintained in accordance with applicable provisions of 40 CFR 279, Subpart B and Subpart G (July 1, 1996 version), Standards For The Management of Used Oil and Chapter 62-710, F.A.C.

c. *Delivery Receipts.* The following shall be recorded on the delivery receipt:
   - the use of tamper proof seals on the delivery receipt
   - the volume of fuel delivery
   - a cross reference to the analysis which establishes that the used oil meets EPA used oil fuel specifications
   - the results of the screening analysis
   - the name of the person performing the test
   - the specific test kit used
   - the amount of oil sampled
   - the amount and name of the solution used to dilute the oil

d. *Delivery Procedures.* The following procedures shall be implemented:
   - On and off specification used oil that is delivered without a delivery receipt containing all the above information, or which is not properly sealed, or for which the delivery receipt does not contain all the necessary information, is not to be accepted and the DERM is to be notified by phone immediately (with written confirmation to follow), if such a delivery is attempted.
   - Verification by signature on the delivery receipt shall be provided by plant personnel that the delivery truck arrived on site with all seals intact. As delivered samples of all used oil fuel received shall be accumulated through each quarter for each supplier.

[DERM Requirements, Rule 62-4.070 (3) F.A.C]

Process and Production Recordkeeping

19. Production Rate Recording: The owner or operator shall record the preheater kiln feed rate using the F.L. Smidth automated preheater feed weighing device and record the daily clinker production. The clinker production rate for the purposes of determining compliance with Specific Condition 6, shall be determined as the product of Preheater Kiln Feed and the Loss on Ignition (LOI) factor. LOI for the preheater kiln feed is based on a 30 operating-day block average of daily measurements. For purposes of this requirement, an operating day is any day that the kiln produces clinker or fires fuel. The calculation shall be expanded as need to consider the additional feed points and LOI.

CEMENT PLANT CLINKER HANDLING & STORAGE SYSTEM

This system addresses the following emissions unit.

ARMS E.U. No.	DESCRIPTION
027	Clinker Handling & Storage System

The clinker handling operations are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I. D: 441.BF540	Conveyance/transfer from cooler to new clinker silos and off-spec silo
Baghouse I. D: 481.BF140	Conveyance/transfer/storage for new clinker silos and off-spec silo
Baghouse I. D: 481.BF330	Storage from off-spec silo and conveyance from new clinker silos
Baghouse I. D: 481.BF540	Conveyance from new clinker silos and off-spec silo to old clinker storage
Baghouse I. D: 481.BF640	Conveyance from new clinker and off-spec silos to old clinker storage area
Baghouse I. D: 481.BF730	Conveyance/transfer to old clinker area and storage clinker silos 2,5,17,18
Baghouse I. D: 481.BF930	Storage clinker silos 21, 22, 23, 26, 27, 28
Baghouse I.D: F-633	Storage clinker silos 12, 19, 20

Operational Requirements

20. Hours of Operation: This emissions unit is allowed to operate 8760 hours per year. Production is automatically limited by the clinker production limits established in Specific Condition 6 for the pyroprocessing system. [Applicant request. Application received April 18, 2005]

Emissions Limitations and Performance Standards

21. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses. Compliance shall be determined in the manner described in 40 CFR 63.1350(a)(4)(*i*), (*ii*), (*iii*) and (*iv*) below except that the applicable standard is 5% instead of 10%.

    (4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

    (i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

    (ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

    (iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.0095 grains/dry standard cubic foot (gr/dscf) and 0.01 gr/acf (Baghouse F-633). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points in this emission unit system will be less than 19.70 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 63, Subpart LLL. [Rules 62-4.070(3), 62-212.400, F.A.C. and 40 CFR 63.1348]

CEMENT PLANT FINISH MILLS SYSTEM

This system addresses the following emissions units.

ARMS E.U. No.	DESCRIPTION
011	Finish Mill No. 1
012	Finish Mill No. 3
013	Finish Mill No. 4
030	Finish Mill No. 6

The finish mill handling operations are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I.D. F-113	Dust collector – Finish Mill No. 1 – Feeder
Baghouse I.D. F-130	Dust collector – Finish Mill No. 1 – Mill Sweep
Baghouse I.D. F-313	Dust collector – Finish Mill No. 3 – Feeder
Baghouse I.D. F-332	Dust collector – Finish Mill No. 3 – Mill Sweep
Baghouse I.D. 533.BF340	Dust collector – Finish Mill No. 3 - O-Sepa Cement Separator
Baghouse I.D. F-432	Dust collector – Finish Mill No. 4 - Belt conveyor/Separator
Baghouse I.D. F-430	Dust collector – Finish Mill No. 4 - Ball Mill/Mill Sweep
Baghouse I.D. F-728	Dust collector – Finish Mill No. 4 – O-Sepa Cement Separator
Baghouse I.D. 536.BF340	Dust collector – Finish Mill No. 6 - O-Sepa Cement Separator
Baghouse I.D. 536.BF500	Dust collector – Finish Mill No. 6 - Sweep

Operational Requirements

22. Hours of Operation: These emissions unit system is allowed to operate 8,760 hours per year. [Application received April 18, 2005.]

23. Finish Mill Process Rates: The maximum total hourly process rate of cement is 359TPH on a 24-hour block average. The individual process rates are 25 TPH (F-113/F-130); 84 TPH (533.BF340/F-313 / F-332) and 140 TPH (F-430 / F-432 / F-728). The owner or operator shall record all hourly process rates, and maintain records for a minimum of 5 years.

    [Application received April 18, 2005, Rules 62-4.070(3); and 62-213.440, F.A.C.]

Emissions Limitations and Performance Standards

24. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses. Compliance shall be determined in the manner described in 40 CFR 63, Section 63.1350(a)(4)(i), (ii), (iii) and (iv) below except that the applicable standard is 5% instead of 10%.

    (4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

(i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

(ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.0095 grains/dry standard cubic foot (gr/dscf) and 0.01 gr/acf (F-113; F-130; F-313; F-330; F-430; F-432). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points in this emission unit system will be less than 133.83 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 63, Subpart LLL}

[Rules 62-4.070(3), 62-212.400, F.A.C. and 40 CFR 63.1348]

Monitoring Requirements

25. Finish Mill Monitoring: The owner or operator of a raw mill and finish mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCDs (PM control devices) of these affected sources, in accordance with the procedures of Method 22 of Appendix A, 40 CFR Part 60 and as required by 40 CFR 63.1350(e), Subpart LLL.

Pursuant to 40 CFR 63.1350(e):

The owner or operator of a raw mill or finish mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCDs of these affected sources, in accordance with the procedures of Method 22 of Appendix A of Part 60 of this chapter. The Method 22 test shall be conducted while the affected source is operating at the highest load or capacity level reasonably expected to occur within the day. The duration of the Method 22 test shall be six minutes. If visible emissions are observed during any Method 22 visible emissions test, the owner or operator must:

(1) Initiate, within one-hour, the corrective actions specified in the site specific operating and maintenance plan developed in accordance with paragraphs (a)(1) and (a)(2) of this section; and

(2) Within 24 hours of the end of the Method 22 test in which visible emissions were observed, conduct a visual opacity test of each stack from which visible emissions were observed in accordance with Method 9. The duration of the Method 9 test shall be thirty minutes.

NOT consistent with LLL

[Rules 62-4.070(3) and 40 CFR 63.1350, Monitoring Requirements]

CEMENT PLANT PRODUCTS STORAGE SILOS/ PACKHOUSE/ LOADOUT SYSTEM

This system addresses the following emissions units.

ARMS E.U. No.	DESCRIPTION
014	Cement Storage
015	Cement Distribution Rail/Truck Loadout
016	Cement Packhouse

The cement handling operations are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I.D. F-511	Dust collector - Cement Silos 1-6
Baghouse I.D. F-512	Dust collector - Cement Silos 7-9
Baghouse I.D. F-513	Dust collector - Cement Silo 10
Baghouse I.D. F-514	Dust collector - Cement Silo 11
Baghouse I.D. F-515	Dust collector - Cement Silo 12
Baghouse I.D. B-110	Dust collector - Bulk Loadout Unit 1 (Rail/Truck).
Baghouse I.D. B-210	Dust collector - Bulk Loadout Unit 2 (Truck).
Baghouse I.D. B-372	Dust collector - Bulk Loadout Unit 3 – Line 1
Baghouse I.D. B-374	Dust collector - Bulk Loadout Unit 3 - Line 2
Baghouse I.D. B-382	Dust collector - Bulk Loadout Unit 3 - Line 3
Baghouse I.D. B-120	Dust collector – Packhouse
Baghouse I.D. B-205	Dust collector – Packhouse
Baghouse I.D. B-400	Dust collector – Packhouse

Operational Requirements

26. Hours of Operation: These emissions units are allowed to operate 8,760 hours per year. [Requested by applicant April 18, 2005. Permit 0250020-016-AC]

27. Cement Storage Silo/Packhouse/Loadout Process and Production Design Specifications: The maximum process input rate to each cement silo and loadout operation is 500 TPH on a 24-hour block average. The maximum production rate of cement in the Packhouse is 170 TPH on a 24-hour block average. [Permit 0250020-016-AC. Requested by applicant April 18, 2005]

Emissions Limitations and Performance Standards

28. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses. Compliance shall be determined in the manner described in 40 CFR 63, Section 63.1350(a)(4)(i), (ii), (iii) and (iv) below except that the applicable standard is 5% instead of 10%.

    (4) Procedures to be used to periodically monitor affected sources subject to opacity standards under Sections 63.1346 and 63.1348. Such procedures must include the provisions of Paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

(i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to [40 CFR] Part 60 of this chapter. The test must be conducted while the affected source is in operation.

(ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six (6) consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of Appendix A to part 60 of this Chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.01 grains/actual cubic foot (gr/acf). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points in this emission unit system will be less than 31.24 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 63, Subpart LLL}

[Rules 62-4.070(3), 62-212.400, F.A.C. and 40 CFR 63.1348]

CEMENT PLANT COAL HANDLING SYSTEM

This system addresses the following emissions unit.

ARMS E.U. No.	DESCRIPTION
026	Coal and Petroleum Coke Handling System

The provisions of 40 CFR 60 Subpart Y, Standards of Performance for Coal Preparation Plants and 40 CFR 60, Subpart A- General Provisions are applicable to this process emissions unit system (Appendix H attached).

The coal handling operations are controlled by the following baghouses:

EMISSION POINT	DESCRIPTION
Baghouse I.D. 461-BF300	Coal Mill [1]
Baghouse I.D. 461-BF130	Dump Hopper (Transfer)
Baghouse I.D. 461-BF230	Conveyors (2) (Transfer) & Coal/Petroleum Coke Feed Bins
Baghouse I.D. 461-BF750	Coke/Petroleum Coke (Transfer) Surge Bin Feeder).
Baghouse I.D. 461-BF650	Coal (Transfer) / Surge Bin (Feeder)
Baghouse I.D. 461.BF350	Coal Mill Feed

1. This emissions unit discharges to the common (main) stack. The Clinker Cooler which is limited to 10% opacity, discharges to the common (main) stack and therefore determines the opacity limit for this emissions unit. Total PM/PM_{10} emissions from Pyroprocessing/Raw Mill/Coal Mill Systems shall not exceed 130.3 and 109.5 TPY respectively.

All of the above process emissions units, except for the dump hopper with baghouse 461-BF130, are subject to 40 CFR 60, Subpart Y, NSPS for Coal Preparation Plants (Appendix H attached).

Operational Requirements

29. Hours of Operation: This emissions unit system is allowed to operate 8,760 hours per year. [Application submitted in April 18, 2005]

30. Coal/Petroleum Coke Maximum Usage: The maximum combined usage of coal and petroleum coke is 30 TPH on a 24-hour block average and 263,000 TPY. The maximum petroleum coke usage rate shall not exceed 20 TPH on a 24-hour block average. Daily records of usage must be kept on site and retained for a minimum of 5 years.

[Rule 62-210.200 & 62-4.070(3) F.A.C., Applicant request; Rule 62-4.070(3), F.A.C.]

Emissions Limitations and Performance Standards

31. Visible Emissions Limits: Visible emissions are limited to 5 percent from each of the above listed baghouses. Compliance shall be demonstrated by EPA Reference Method 9 and the procedures specified in 40 CFR 60.11.

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For the coal mill ~~main~~ baghouse 461-BF300, the opacity shall not exceed 10%. Compliance shall be demonstrated pursuant to EPA Reference Method 9. Annual emissions of PM/PM_{10} for the kiln/cooler/coal mill main stack shall not exceed 110 TPY

State VE limit for

{Note: The applicant advised that the baghouses are designed to control particulate emissions to 0.0095 grains/dry standard cubic foot (gr/dscf) and to 0.01 grains/actual cubic foot (gr/acf) (for baghouses 461-BF300; 461.BF350). The 5% opacity limitation is consistent with this design and provides reasonable assurance that annual emissions of PM/PM_{10} for all emission points in this emission unit system will be less than 3.10 TPY. This annual emission estimate is part of the facility-wide netting calculation to escape PSD applicability for PM/PM_{10}. Exceedance of the 5% opacity limit shall be deemed an exceedance of this permit condition and not necessarily an exceedance of the opacity limitations given in 40 CFR 60, Subpart Y}

[40 CFR 60, Subpart Y; Rules 62-297.620(4), F.A.C., 62-4.070(3), and 62-212.400, F.A.C. and 40 CFR 63.1348]

32. Particulate and Fugitive Emissions: Particulate and fugitive emissions from coal handling facilities shall be minimized by following the procedures listed below:

    a. All conveyers and transfer points shall be enclosed or covered to preclude particulate emissions (except those directly associated with coal stacking/reclaiming).

    b. Coal storage piles shall be shaped, compacted and oriented to minimize wind erosion.

    c. Water sprays or chemical wetting agents and stabilizers shall be applied to storage piles, handling equipment, etc., during dry periods as necessary to all facilities to maintain an opacity of less than 20 percent at the property line for fugitive emission sources.

    [Rule 62-296.320(4)(c), F.A.C.; 62-4.070(3)]

CEMENT PLANT FUGITIVE EMISSIONS

This system addresses the following emissions unit.

ARMS E.U. No.	DESCRIPTION
031	Fugitive Emissions – Transportation, Miscellaneous Transfers, and Storage

Unregulated Emissions Unit and/or Activities. This is an emissions unit which emits no "emissions-limited pollutant" and which is subject to no unit-specific work practice standard, though it may be subject to regulations applied on a facility-wide basis (e.g., unconfined emissions, odor, general opacity) or to regulations that require only that it be able to prove exemption from unit-specific emissions or work practice standards.

Vehicular traffic and coal, petcoke, and raw material transfer points generate fugitive PM emissions from the handling, transfer, and storage between the unloading areas and the storage building. The activities are listed in the following table:

ACTIVITY	DESCRIPTION	ESTIMATED EMISSIONS (PM and PM_{10})[1]
Coal Handling	Drop Operations	0.17 and 0.059 TPY
Coal Handling	Vehicular Traffic	6.9 and 2.4 TPY
Raw Material Blending	Drop Operations	1.6 and 0.6 TPY
Raw Material Blending	Vehicular Traffic	14 and 4.9 TPY
Total Quantifiable Emissions	Fugitive Emissions	23 and 8 TPY

Support Y

1. The estimates given were included in calculations by the applicant demonstrating that the modernization and production increase projects do not trigger PSD. It is not practicable to actually measure the emissions directly. Reasonable assurance that these emissions are controlled to the levels given above is by adherence to the Reasonable Precautions listed below.

[Application received April 18, 2005; Rule 62-4.070(3), F.A.C.]

33. Reasonable Precautions for Emissions of Unconfined Particulate Matter: This facility is subject to applicable requirements of Rule 62-296.320(4)(c)1, 2, 3, & 4, F.A.C. Refer to Appendix C: Common Conditions.

34. Additional Reasonable Precautions for Emissions of Unconfined Particulate Matter: Pursuant to Rule 62-296.320(4)(c)2, F.A.C, the permittee shall implement the following additional reasonable precautions at this facility:

PERSONNEL

a. Aggregate and material handling personnel, their supervisors, and environmental personnel, shall be trained in visible emissions, permit conditions related to fugitive emissions, and the Best Management Practices developed by Titan to implement the Fugitive Dust Improvement Plan under Appendix D.

b. Personnel shall be trained on proper operation of wet-dry sweeper and water trucks. Training shall include but not be limited to speed, nozzle operation, and cleaning patterns around the plants that comprise the facility.

ROADS

c. Identify areas where the installation of speed bumps would be beneficial in reducing vehicular speed and fugitive emissions. Install the additional speed bumps by June 30, 2006.

d. Clean and maintain paved road surfaces, which includes removing silt build-up, repairing all potholes, sweeping on a daily basis and utilizing a water truck to control visible emissions.

e. Pave the manufacturing areas in the cement plant, the block area, the ready-mix plant, and the access roadways for the facility with asphalt or concrete.

f. Maintain dedicated berm areas that have been established throughout the facility to further reduce wind erosion from ground areas.

g. Install a sprinkler system to reduce dust along the aggregate road between the pits and the storage building.

h. Improve the main entrance by establishing green areas between the security gate and the main facilities.

MATERIALS

i. To the extent feasible, raw materials and fuels for the cement facility will be storage inside the raw material building. All material within the raw material building will be moved by stacker/reclaimer and covered conveyor belts.

j. All conveyors are to be enclosed on at least three sides.

k. The facility shall continue to maintain the clinker production area and continue to implement a cleaning process inside buildings to minimize dust emitted to the outside environment.

l. Unloading and reclaiming of materials will be curtailed during windy or dry conditions.

m. Raw materials will be managed to minimize their time in storage.

TRUCKS

n. All trucks leaving the aggregate facility will be required to dewater and drive through the tire wash system.

o. Titan America/Tarmac will work with all transport companies to further educate drivers in the Florida Department of Transportation requirements that all loads be tarped prior to leaving the facility.

p. All trucks traveling within the cement facility should stay on asphalt or concrete surfaces. All road surfaces outside of the aggregate facility shall be constructed of concrete and/or asphalt.

[Rule 62-296.320(4)(c)2.,F.A.C., Rule 62-4. 070(3)F.A.C., Application received April 18, 2005 and, Fugitive Dust Improvement Plan dated August 19, 2005]

35. Fugitive Dust Improvement Plan: The owner or operator shall implement the Fugitive Dust Improvement Plan attached as Appendix D. The permittee shall submit quarterly progress reports to include a status report on each specific action implemented under Appendix D (part of the permit). The first quarterly report shall be submitted in January 2006, with updates every 3 months thereafter for a two-year period. The progress reports shall be submitted to the Compliance Authority (Miami-Dade County DERM).

CEMENT PLANT EMISSIONS UNITS APPLICABLE RULES COMMON CONDITIONS

The following conditions are applicable to the following emissions units as required:

ARMS Emission Unit No.	EMISSION UNIT DESCRIPTION
010	Finish Mill No. 1
012	Finish Mill No. 3
013	Finish Mill No. 4
030	Finish Mill No. 6
014	Cement Storage Silos 1 through 12
015	Cement Distribution, Rail and Truck Loadout
016	Cement Packhouse
026	Coal Handling System
027	Clinker Handling and Storage
028	Raw Mill and Pyroprocessing System
029	Raw Material Handling

36. All of the listed emission units have at least one component that is subject to 40 CFR 63, Subpart LLL - National Emission Standards for Hazardous Air Pollutants from the Portland Cement Manufacturing Industry. The listed emission units shall comply with Subpart LLL only to the extent that the regulations apply to the facility or its operations.

37. Some of the listed emission units have at least one component that was subject to 40 CFR 60, Subpart F - Standards of Performance for Portland Cement Plants (NSPS) when originally constructed. The listed emission units shall comply with Subpart F only to the extent that the applicable Subpart F requirements were not subsumed by 40 CFR 63, Subpart LLL.

38. The listed emission units shall comply with 40 CFR 60 Subpart A, General Provisions and 40 CFR 63, Subpart A, General Provisions only to the extent that the requirements apply to the facility or its operations.

39. Emissions Units 027 and 028 are subject to Rule 62-296.701, F.A.C., Portland Cement Plants. Emissions Unit 026 is subject to 40 CFR 60 Subpart Y, Standards of Performance for Coal Preparation Plants.

40. If a previously permitted facility or modification becomes a facility or modification which would be subject to the preconstruction review requirements of this rule if it were a proposed new facility or modification solely by virtue of a relaxation in any federally enforceable limitation on the capacity of the facility or modification to emit a pollutant (such as a restriction on hours of operation), which limitation was established after August 7, 1980, then at the time of such relaxation the preconstruction review requirements of this rule shall apply to the facility or modification as though construction had not yet commenced on it.

    [Rule 62-212.400 (2) (g) F.A.C.]

    {This facility modification avoided preconstruction review pursuant to Paragraph 62-212.400, F.A.C., except for CO, by taking federally enforceable limitations on the capacity to emit certain criteria pollutants from each of the emission units listed above.}

The Department adopted the provisions of the referenced NSPS and NESHAPS regulations from 40 CFR 60 and 40 CFR 63, respectively by reference into Rule 62-204.800, F.A.C. The provisions of these regulations are included in this permit as attached Appendices.

{Permitting Note: The numbering of the original rules has been preserved for ease of reference to the rules. The term "Administrator" when used in 40 CFR 60 shall mean the Secretary or the Secretary's designee.}

TABLE OF CONTENTS OF APPENDICES (made part of this permit)

APPENDICES

SECTION IV APPENDIX A
CITATION FORMATS

The following examples illustrate the format used in the permit to identify applicable permitting actions and regulations.

REFERENCES TO PREVIOUS PERMITTING ACTIONS

Old Permit Numbers

Example: Permit No. AC50-123456 or Air Permit No. AO50-123456

Where: "AC" identifies the permit as an Air Construction Permit
"AO" identifies the permit as an Air Operation Permit
"123456" identifies the specific permit project number

New Permit Numbers

Example: Permit Nos. 099-2222-001-AC, 099-2222-001-AF, 099-2222-001-AO, or 099-2222-001-AV

Where: "099" represents the specific county ID number in which the project is located
"2222" represents the specific facility ID number
"001"identifies the specific permit project
"AC" identifies the permit as an air construction permit
"AF" identifies the permit as a minor federally enforceable state operation permit
"AO" identifies the permit as a minor source air operation permit
"AV" identifies the permit as a Title V Major Source Air Operation Permit

PSD Permit Numbers

Example: Permit No. PSD-FL-317

Where: "PSD" means issued pursuant to the Prevention of Significant Deterioration of Air Quality
"FL" means that the permit was issued by the State of Florida
"317" identifies the specific permit project

RULE CITATION FORMATS

Florida Administrative Code (F.A.C.)

Example: [Rule 62-213.205, F.A.C.]

Means: Title 62, Chapter 213, Rule 205 of the Florida Administrative Code

Code of Federal Regulations (CFR)

Example: [40 CRF 60.7]

Means: Title 40, Part 60, Section 7

SECTION IV APPENDIX B
GENERAL CONDITIONS

The permittee shall comply with the following general conditions from Rule 62-4.160, F.A.C.

1. The terms, conditions, requirements, limitations, and restrictions set forth in this permit are "Permit Conditions" and are binding and enforceable pursuant to Sections 403.161, 403.727, or 403.859 through 403.861, Florida Statutes. The permittee is placed on notice that the Department will review this permit periodically and may initiate enforcement action for any violation of these conditions.

2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this permit may constitute grounds for revocation and enforcement action by the Department.

3. As provided in Subsections 403.087(6) and 403.722(5), Florida Statutes, the issuance of this permit does not convey and vested rights or any exclusive privileges. Neither does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations. This permit is not a waiver or approval of any other Department permit that may be required for other aspects of the total project which are not addressed in the permit.

4. This permit conveys no title to land or water, does not constitute State recognition or acknowledgment of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title.

5. This permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, or plant life, or property caused by the construction or operation of this permitted source, or from penalties therefore; nor does it allow the permittee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department.

6. The permittee shall properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this permit, as required by Department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the permit and when required by Department rules.

7. The permittee, by accepting this permit, specifically agrees to allow authorized Department personnel, upon presentation of credentials or other documents as may be required by law and at a reasonable time, access to the premises, where the permitted activity is located or conducted to:

   a. Have access to and copy and records that must be kept under the conditions of the permit;
   b. Inspect the facility, equipment, practices, or operations regulated or required under this permit, and,
   c. Sample or monitor any substances or parameters at any location reasonably necessary to assure compliance with this permit or Department rules.

   Reasonable time may depend on the nature of the concern being investigated.

8. If, for any reason, the permittee does not comply with or will be unable to comply with any condition or limitation specified in this permit, the permittee shall immediately provide the Department with the following information:

   a. A description of and cause of non-compliance; and

   b. The period of noncompliance, including dates and times; or, if not corrected, the anticipated time the non-compliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the non-compliance.

   The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the Department for penalties or for revocation of this permit.

9. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source which are submitted to the Department may be used by the Department as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or Department rules, except where such use is prescribed by Sections 403.73 and 403.111, Florida Statutes.

Such evidence shall only be used to the extent it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

10. The permittee agrees to comply with changes in Department rules and Florida Statutes after a reasonable time for compliance, provided, however, the permittee does not waive any other rights granted by Florida Statutes or Department rules.

11. This permit is transferable only upon Department approval in accordance with Florida Administrative Code Rules 62-4.120 and 62-730.300, F.A.C., as applicable. The permittee shall be liable for any non-compliance of the permitted activity until the transfer is approved by the Department.

12. This permit or a copy thereof shall be kept at the work site of the permitted activity.

13. This permit also constitutes:

    a. Determination of Best Available Control Technology for CO (X);
    b. Determination of Prevention of Significant Deterioration for CO (X);
    c. Compliance with New Source Performance Standards (X) and
    d. Compliance with National Emissions Standards for Hazardous Air Pollutants (X).

14. The permittee shall comply with the following:

    a. Upon request, the permittee shall furnish all records and plans required under Department rules. During enforcement actions, the retention period for all records will be extended automatically unless otherwise stipulated by the Department.

    b. The permittee shall hold at the facility or other location designated by this permit records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation) required by the permit, copies of all reports required by this permit, and records of all data used to complete the application or this permit. These materials shall be retained at least three years from the date of the sample, measurement, report, or application unless otherwise specified by Department rule.

    c. Records of monitoring information shall include:

        1) The date, exact place, and time of sampling or measurements;
        2) The person responsible for performing the sampling or measurements;
        3) The dates analyses were performed;
        4) The person responsible for performing the analyses;
        5) The analytical techniques or methods used; and
        6) The results of such analyses.

15. When requested by the Department, the permittee shall within a reasonable time furnish any information required by law which is needed to determine compliance with the permit. If the permittee becomes aware that relevant facts were not submitted or were incorrect in the permit application or in any report to the Department, such facts or information shall be corrected promptly.

{Permitting Note: Unless otherwise specified in the permit, the following conditions apply to all emissions units and activities at the facility.}

EMISSIONS AND CONTROLS

1. Plant Operation - Problems: If temporarily unable to comply with any of the conditions of the permit due to breakdown of equipment or destruction by fire, wind or other cause, the permittee shall notify each Compliance Authority as soon as possible, but at least within one working day, excluding weekends and holidays. The notification shall include: pertinent information as to the cause of the problem; steps being taken to correct the problem and prevent future recurrence; and, where applicable, the owner's intent toward reconstruction of destroyed facilities. Such notification does not release the permittee from any liability for failure to comply with the conditions of this permit or the regulations. [Rule 62-4.130, F.A.C.]

2. General Pollutant Emission Limiting Standards. Objectionable Odor Prohibited. No person shall cause, suffer, allow, or permit the discharge of air pollutants, which cause or contribute to an objectionable odor.

   [Rule 62-296.320(2), F.A.C.]

3. General Particulate Emission Limiting Standards. General Visible Emissions Standard.

   Except for emissions units that are subject to a particulate matter or opacity limit set forth or established by rule and reflected by conditions in this permit, no person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity, the density of which is equal to or greater than that designated as Number 1 on the Ringelmann Chart (20 percent opacity). EPA Method 9 is the method of compliance pursuant to Chapter 62-297, F.A.C.

   [Rules 62-296.320(4)(b)1. & 4., F.A.C.]

4. General Pollutant Emission Limiting Standards. Volatile Organic Compounds (VOC) Emissions or Organic Solvents (OS) Emissions. The permittee shall allow no person to store, pump, handle, process, load, unload or use in any process or installation, volatile organic compounds (VOC) or organic solvents (OS) without applying known and existing vapor emission control devices or systems deemed necessary and ordered by the Department.

   [Rule 62-296.320(1)(a), F.A.C

5. Circumvention: The permittee shall not circumvent the air pollution control equipment or allow the emission of air pollutants without this equipment operating properly. [Rule 62-210.650, F.A.C.]

6. Excess Emissions Allowed: Excess emissions resulting from startup, shutdown or malfunction of any emissions unit shall be permitted providing (1) best operational practices to minimize emissions are adhered to and (2) the duration of excess emissions shall be minimized but in no case exceed two hours in any 24 hour period unless specifically authorized by the Department for longer duration. [Rule 62-210.700(1), F.A.C.]

7. Excess Emissions Prohibited: Excess emissions caused entirely or in part by poor maintenance, poor operation, or any other equipment or process failure that may reasonably be prevented during startup, shutdown or malfunction shall be prohibited. [Rule 62-210.700(4), F.A.C.]

{Permitting Note: The Excess Emissions Rule at Rule 62-210.700, F.A.C., cannot vary any requirement of a NSPS or NESHAP provision.}

8. Volatile Organic Compounds (VOC) or Organic Solvents (OS) Emissions: No person shall store, pump, handle, process, load, unload or use in any process or installation, volatile organic compounds or organic solvents without applying known and existing vapor emission control devices or systems deemed necessary and ordered by the Department. [Rule 62-296.320(1), F.A.C.]

9. Objectionable Odor Prohibited: No person shall cause, suffer, allow or permit the discharge of air pollutants, which cause or contribute to an objectionable odor. An "objectionable odor" means any odor present in the outdoor atmosphere which by itself or in combination with other odors, is or may be harmful or injurious to human health or welfare, which unreasonably interferes with the comfortable use and enjoyment of life or property, or which creates a nuisance. [Rules 62-296.320(2) and62-210.200(203), F.A.C.]

10. General Visible Emissions: No person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity equal to or greater than 20 percent opacity. This regulation does not impose a specific testing requirement. [Rule 62-296.320(4)(b)1, F.A.C.]

11. Unconfined Emissions of Particulate Matter:

(1) No person shall cause, let, permit, suffer or allow the emissions of unconfined particulate matter from any activity, including vehicular movement; transportation of materials; construction, alteration, demolition or wrecking; or industrially related activities such as loading, unloading, storing or handling; without taking reasonable precautions to prevent such emissions.

(2) Any permit issued to a facility with emissions of unconfined particulate matter shall specify the reasonable precautions to be taken by that facility to control the emissions of unconfined particulate matter.

(3) Reasonable precautions include the following:

a. Paving and maintenance of roads, parking areas and yards.
b. Application of water or chemicals to control emissions from such activities as demolition of buildings, grading roads, construction, and land clearing.
c. Application of asphalt, water, chemicals or other dust suppressants to unpaved roads, yards, open stock piles and similar activities.
d. Removal of particulate matter from roads and other paved areas under the control of the owner or operator of the facility to prevent reentrainment, and from buildings or work areas to prevent particulate from becoming airborne.
e. Landscaping or planting of vegetation.
f. Use of hoods, fans, filters, and similar equipment to contain, capture and/or vent particulate matter.
g. Confining abrasive blasting where possible.
h. Enclosure or covering of conveyor systems.

Additional reasonable precautions applicable to this facility are included in Section III of the Permit under Subsection: Cement Plant Fugitives Emissions and Appendix D: Fugitive Dust Improvement Plan.

(4) In determining what constitutes reasonable precautions for a particular source, the Department shall consider the cost of the control technique or work practice, the environmental impacts of the technique or practice, and the degree of reduction of emissions expected from a particular technique or practice.

[Rule 62-296.320(4)(c), F.A.C.]

TESTING REQUIREMENTS

12. Required Number of Test Runs: For mass emission limitations, a compliance test shall consist of three complete and separate determinations of the total air pollutant emission rate through the test section of the stack or duct and three complete and separate determinations of any applicable process variables corresponding to the three distinct time periods during which the stack emission rate was measured; provided, however, that three complete and separate determinations shall not be required if the process variables are not subject to variation during a compliance test, or if three determinations are not necessary in order to calculate the unit's emission rate. The three required test runs shall be completed within one consecutive five-day period. In the event that a sample is lost or one of the three runs must be discontinued because of circumstances beyond the control of the owner or operator, and a valid third run cannot be obtained within the five-day period allowed for the test, the Secretary or his or her designee may accept the results of two complete runs as proof of compliance, provided that the arithmetic mean of the two complete runs is at least 20% below the allowable emission limiting standard. [Rule 62-297.310(1), F.A.C.]

13. Operating Rate During Testing: Testing of emissions shall be conducted with the emissions unit operating at permitted capacity. Permitted capacity is defined as 90 to 100 percent of the maximum operation rate allowed by the permit. If it is impractical to test at permitted capacity, an emissions unit may be tested at less than the maximum permitted capacity; in this case, subsequent emissions unit operation is limited to 110 percent of the test rate until a new test is conducted. Once the unit is so limited, operation at higher capacities is allowed for no more than 15 consecutive days for the purpose of additional compliance testing to regain the authority to operate at the permitted capacity.

Emissions testing shall be performed at the kiln/cooler main stack during a period when the kiln. precalciner, cooler, raw mill and preheater are operating simultaneously and under normal operating conditions. EPA-reference methods for sampling pollutants shall be as specified in 40 CFR 63, Appendix A. These emissions units shall comply with all applicable requirements of Rule 62-297.310, F.A.C. General Test Requirements and 40 CFR 63.1349, Performance Tests.

The permittee shall provide the DERM with a *protocol* that will outline the different fuel scenarios (% of total heat input) that this unit will be burning. Titan shall obtain the test data necessary to determine whether this kiln is capable of accommodating the burning of coal or petroleum coke and all of the other supplemental fuels specified on Section III, Specific Condition 9. Methods of Operation – Fuels (Pyroprocessing/Raw Mill System). The fuel scenarios tested shall represent the actual combustion percentage (% of total heat input) that is going to be maintained while burning supplemental fuels during normal operation. The frequency of testing shall be determined by the DERM.

[Rules 62-297.310(2) & (2)(b), F.A.C.]

14. Calculation of Emission Rate: For each emissions performance test, the indicated emission rate or concentration shall be the arithmetic average of the emission rate or concentration determined by each of the three separate test runs unless otherwise specified in a particular test method or applicable rule. [Rule 62-297.310(3), F.A.C.]

15. Test Performance Requirements: Tests shall be conducted in accordance with all applicable requirements of 40CFR60, Subpart A - General Provisions and 40CFR63, Subpart A – General Provisions. In the event that the facility fails any initial or annual performance test, a retest shall be conducted within 30 days of the test date of the failed test.

16. Applicable Test Procedures.

(a) Required Sampling Time.

1. Unless otherwise specified in the applicable rule, the required sampling time for each test run shall be no less than one hour and no greater than four hours, and the sampling time at each sampling point shall be of equal intervals of at least two minutes.
2. Opacity Compliance Tests. When EPA Method 9 is specified as the applicable opacity test method, the required minimum period of observation for a compliance test shall be sixty (60) minutes for emissions units which emit or have the potential to emit 100 tons per year or more of particulate matter, and thirty (30) minutes for emissions units which have potential emissions less than 100 tons per year of particulate matter and are not subject to a multiple-valued opacity standard. The opacity test observation period shall include the period during which the highest opacity emissions can reasonably be expected to occur.

Exceptions to these requirements are as follows:

a. The minimum observation period for opacity tests conducted by employees or agents of the Department to verify the day-to-day continuing compliance of a unit or activity with an applicable opacity standard shall be twelve minutes.
b. For batch, cyclical processes, or other operations which are normally completed within less than the minimum observation period and do not recur within that time, the period of observation shall be equal to the duration of the batch cycle or operation completion time.
c. The observation period for special opacity tests that are conducted to provide data to establish a surrogate standard pursuant to Rule 62-297.310(5)(k), F.A.C., Waiver of Compliance Test Requirements, shall be established as necessary to properly establish the relationship between a proposed surrogate standard and an existing mass emission limiting standard.

(b) *Minimum Sample Volume.* Unless otherwise specified in the applicable rule, the minimum sample volume per run shall be 25 dry standard cubic feet.

(c) *Required Flow Rate Range.* For EPA Method 5 particulate sampling, acid mist/sulfur dioxide, and fluoride sampling which uses Greenburg Smith type impingers, the sampling nozzle and sampling time shall be selected such that the average sampling rate will be between 0.5 and 1.0 actual cubic feet per minute, and the required minimum sampling volume will be obtained.

(d) *Calibration of Sampling Equipment.* Calibration of the sampling train equipment shall be conducted in accordance with the schedule shown in Table 297.310-1 (attached).

(e) *Allowed Modification to EPA Method 5.* When EPA Method 5 is required, the following modification is allowed: the heated filter may be separated from the impingers by a flexible tube.

[Rule 62-297.310(4), F.A.C.]

17. Determination of Process Variables

    a. *Required Equipment.* The owner or operator of an emissions unit for which compliance tests are required shall install, operate, and maintain equipment or instruments necessary to determine process variables, such as process weight input or heat input, when such data are needed in conjunction with emissions data to determine the compliance of the emissions unit with applicable emission limiting standards.

    b. *Accuracy of Equipment.* Equipment or instruments used to directly or indirectly determine process variables, including devices such as belt scales, weight hoppers, flow meters, and tank scales, shall be calibrated and adjusted to indicate the true value of the parameter being measured with sufficient accuracy to allow the applicable process variable to be determined within 10% of its true value.

    [Rule 62-297.310(5), F.A.C.]

18. Sampling Facilities: The permittee shall install permanent stack sampling ports and provide sampling facilities that meet the requirements of Rule 62-297.310(6), F.A.C. Refer to Appendix SS-1 Stack Sampling Facilities, attached to this permit.

19. Test Notification: The owner or operator shall notify in writing to the Compliance Authority, at least *30 days* (initial) and *15 days* (annual) prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator. [Rule 62-297.310(7)(a)9, F.A.C.]

20. Exceptions and Approval of Alternate Procedures and Requirements: An Alternate Sampling Procedure (ASP) may be requested from the Bureau of Monitoring and Mobile Sources of the Florida Department of Environmental Protection in accordance with the procedures specified in Rule 62-297.620, F.A.C.

21. Frequency of Compliance Tests. The following provisions apply only to those emissions units that are subject to an emissions limiting standard for which compliance testing is required.

    (a) *General Compliance Testing.*

    1. The owner or operator of an emissions unit that is subject to any emission limiting standard shall conduct a compliance test that demonstrates compliance with the applicable emission limiting standard prior to obtaining a renewed operation permit. Emissions units that are required to conduct an annual compliance test may submit the most recent annual compliance test to satisfy the requirements of this provision. In renewing an air operation permit pursuant to Rule 62-210.300(2)(a)3.b., c., or d., F.A.C., the Department shall not require submission of emission compliance test results for any emissions unit that, during the year prior to renewal:

        a. Did not operate; or

        b. In the case of a fuel burning emissions unit, burned liquid fuel for a total of no more than 400 hours.

    2. During each federal fiscal year (October 1 - September 30), unless otherwise specified by rule, order, or permit, the owner or operator of each emissions unit shall have a formal compliance test conducted for:

        a. Visible emissions, if there is an applicable standard;

        b. Each of the following pollutants, if there is an applicable standard, and if the emissions unit emits or has the potential to emit: 5 tons per year or more of lead or lead compounds measured as elemental lead; or 100 tons per year or more of any other regulated air pollutant; and,

        c. Each NESHAP pollutant, if there is an applicable emission standard.

    3. The owner or operator shall notify the Department, at least 15 days prior to the date on which each formal compliance test is to begin, of the date, time, and place of each such test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner or operator.

    (b) *Special Compliance Tests.* When the Department, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe that any applicable emission standard contained in a Department rule or in a permit issued pursuant to those rules is being violated, it may require the owner or operator of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the Department.

    (c) *Waiver of Compliance Test Requirements.* If the owner or operator of an emissions unit that is subject to a compliance test requirement demonstrates to the Department, pursuant to the procedure established in Rule 62-297.620, F.A.C., that the compliance of the emissions unit with an applicable weight emission limiting standard can be adequately determined by means other than the designated test procedure, such as specifying a surrogate

standard of no visible emissions for particulate matter sources equipped with a bag house or specifying a fuel analysis for sulfur dioxide emissions, the Department shall waive the compliance test requirements for such emissions units and order that the alternate means of determining compliance be used, provided, however, the provisions of Rule 62-297.310(7)(b), F.A.C., shall apply.

[Rule 62-297.310(7), F.A.C.; 40 CFR 63.1349(c)]

22. Test Reports: The owner or operator of an emissions unit for which a compliance test is required shall file a report with the Department on the results of each such test. The required test report shall be filed with the Department as soon as practical but no later than 45 days after the last sampling run of each test is completed. The test report shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the Department to determine if the test was properly conducted and the test results properly computed. As a minimum, the test report, other than for an EPA or DEP Method 9 test, shall provide the following information:

    1. The type, location, and designation of the emissions unit tested.
    2. The facility at which the emissions unit is located.
    3. The owner or operator of the emissions unit.
    4. The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
    5. The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.
    6. The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
    7. A sketch of the duct within 8 stack diameters upstream and 2 stack diameters downstream of the sampling ports, including the distance to any upstream and downstream bends or other flow disturbances.
    8. The date, starting time and duration of each sampling run.
    9. The test procedures used, including any alternative procedures authorized pursuant to Rule 62-297.620, F.A.C. Where optional procedures are authorized in this chapter, indicate which option was used.
    10. The number of points sampled and configuration and location of the sampling plane.
    11. For each sampling point for each run, the dry gas meter reading, velocity head, pressure drop across the stack, temperatures, average meter temperatures and sample time per point.
    12. The type, manufacturer and configuration of the sampling equipment used.
    13. Data related to the required calibration of the test equipment.
    14. Data on the identification, processing and weights of all filters used.
    15. Data on the types and amounts of any chemical solutions used.
    16. Data on the amount of pollutant collected from each sampling probe, the filters, and the impingers, are reported separately for the compliance test.
    17. The names of individuals who furnished the process variable data, conducted the test, analyzed the samples and prepared the report.
    18. All measured and calculated data required to be determined by each applicable test procedure for each run.
    19. The detailed calculations for one run that relate the collected data to the calculated emission rate.
    20. The applicable emission standard and the resulting maximum allowable emission rate for the emissions unit plus the test result in the same form and unit of measure.
    21. A certification that, to the knowledge of the owner or his authorized agent, all data submitted are true and correct. When a compliance test is conducted for the Department or its agent, the person who conducts the test shall provide the certification with respect to the test procedures used. The owner or his authorized agent shall certify that all data required and provided to the person conducting the test are true and correct to his knowledge.

[Rule 62-297.310(8), F.A.C.]

RECORDS AND REPORTS

23. Records Retention: Upon request, the permittee shall furnish all records and plans required under DERM and FDEP rules. During enforcement actions, the retention period for all records will be extended automatically unless otherwise stipulated by the DERM. The permittee shall hold at the facility or other location designated by this permit records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation) required by the permit, copies of all reports required by this permit, and records of all data used to complete the application for this permit. These materials shall be retained at least five years from the date of the sample, measurement, report, or application unless otherwise specified by DERM or FDEP rule.

    [Rules 62-4.160(14)(a)&(b) and 62-213.440(1)(b)2.b., F.A.C.]

24. Excess Emissions Report: If excess emissions occur, the owner or operator shall notify the Air Facilities Section of the DERM, within (1) working day (excluding weekends and legal holidays) of: the nature, extent, and duration of the excess emissions; the cause of the excess emissions; and the actions taken to correct the problem. In addition, the DERM may request a written summary report of the incident.

    [Rules 62-4.130 and 62-210.700(6), F.A.C.]

25. Excess Emissions Malfunction Notification Report - Malfunctions: In case of excess emissions resulting from malfunctions, each owner or operator shall notify the DERM in accordance with Rule 62-4.130, F.A.C. In addition, a full written report on the malfunctions shall be submitted in a quarterly report.

    [Rule 62-210.700(6), F.A.C.]

26. Annual Operating Report: The permittee shall submit an annual report that summarizes the actual operating rates and emissions from this facility. Annual operating reports shall be submitted to DERM, the Compliance Authority, by March 1st of each year. [Rule 62-210.370(2), F.A.C.]

27. Central File Requirements: This facility shall maintain a central file containing all measurements, records, and other data that are required to be collected pursuant to the various specific conditions of this permit. Operators shall keep a daily Operation and Maintenance log to include, at a minimum, the following information:

    - The data collected from in-stack monitoring instruments
    - The records on daily feed rates and clinker production rate
    - The amount and type of fuel burned
    - Calibration logs for all instruments
    - Maintenance/repair logs for any work performed on equipment or instrument which is subject to this permit;
    - The following fuel records shall be maintained for a minimum of five (5) years and made available upon request:

        1. Coal/Petroleum Coke
            (a) The coal/petroleum coke usage rate in tons per hour on a 24-hour basis;
            (b) The average sulfur content and heating value (Btu/lb) of each coal shipment based upon supplier analysis or analysis of a sample representative of the shipment (trainload).
        2. Liquid Fuels
            (a) The fuel type (number) and usage rate in gal per day;
            (b) Records of the sulfur content and heating value (Btu/gal) of each oil shipment based upon supplier analysis or analysis of a sample representative of the shipment.
        3. Natural Gas
            (a) The fuel usage rate in MMBtu per day;

    All measurements, records, and any other data required to be maintained by Titan shall be retained for at least five (5) years following the date on which such measurements, records, or data are recorded. These data shall be made available to the DERM upon request. DERM shall be notified in writing at least 15 days prior to the testing (auditing) of any emission measurement instrument required to be operated by these specific conditions in order to allow witnessing by authorized personnel.
    [Rule 62-4.070(3), F.A.C.]

OTHER REQUIREMENTS

28. Used Oil and Grease: Used oil and grease burned at this facility shall not be a hazardous waste as defined by 40 CFR Part 261.3 or Rule 62-730.030, F.A.C. It shall not include fuels or blended fuels consisting in whole or in part of hazardous waste or which include mixture of any solid waste generated from the treatment, storage, or disposal of hazardous waste. These fuels shall be burned in compliance with Section 403.769(3), Florida Statutes.
29. Other Regulations: The owner or operator shall comply with applicable provisions of Rule 62-710, Used Oil Management and 40 CFR Parts 279, Standards for the Management of Used Oil.

APPENDIX D
Fugitive Dust Improvement Plan

Pursuant to Rule 62-296.320(4)(c)2., F.A.C., Reasonable Precautions for Emissions of Unconfined Particulate Matter, the permittee shall take the following additional specific reasonable precautions within the timeframes specified to control facility-wide emissions of unconfined particulate matter (PM) {see the scheduled timeframes immediately following each action}:

a. The applicant completed a preliminary evaluation of changes and improvements to the traffic patterns at the facility, as well as the need for additional paving, in order to further reduce fugitive dust emissions. The specific actions below are required to be completed in order to improve traffic patterns.

  i. The permittee shall reroute truck traffic associated with the Packhouse. A new entrance road shall be constructed by extending 106th Avenue north along the east side of the property, just east of the old ESPs. This road improvement will be implemented in cooperation with the City of Medley. Once the entrance road is completed, the limerock road from the Packhouse to 106th Avenue shall be paved. This will reduce truck traffic on the Main plant entrance road (off U.S. 27), and will reduce fugitive emissions from unpaved roads. *Anticipated Schedule:* Dependent upon the City of Medley to improve 106th Avenue.

  ii. The permittee shall work with the City of Medley to upgrade 102nd Road. This will reduce carry-in of road dust on trucks entering the Titan property from 102nd Road, and also improve the drainage of accumulation of silt within the roadway. Schedule: The permittee is currently working with City of Medley. Schedule will be dependent on the City of Medley.

  iii. After these preliminary actions have been completed, the permittee shall submit a final evaluation of any further changes and improvements to the traffic patterns at the facility, as well as the need for additional paving, in order to reduce fugitive dust emissions.

b. The permittee shall berm exposed areas of the plant to prevent truck traffic from traveling over such areas. Schedule: Already implemented and ongoing.

c. The permittee shall install a wheel wash system in an area directly leading out of the Aggregate Plant. This area will also include a dewatering area for trucks which will assist in cutting down on the amount of drag-out from the facility. Schedule: Operational by April 30, 2006.

d. The permittee shall take measures to minimize silt buildup on the paved road leading out of the Aggregate Plant. This will reduce silt re-entrainment and carryout by trucks. Schedule: Measures implemented beginning in October 2005 and finalized with the addition of the new water truck in December 2005.

e. The permittee currently employs one (1) watering truck with a dedicated driver to provide water suppression on the paved roads in the plant. The permittee issued a purchase order for a second watering truck with pressure spray. This second truck will provide a more effective watering program to reduce fugitive PM emission throughout the facility. Schedule: Exact delivery date is unknown; expected by December 2005.

f. The permittee shall operate road sweepers 5 days a week at the facility. Road sweepers shall be used on high traffic roads. Schedule: This sweeping program has already been implemented and is proving to be effective in reducing fugitive PM emissions.

g. A sprinkler system shall be installed along the main haul road from the quarry to the Aggregate Plant. This will reduce fugitive PM emissions from this unpaved road. Schedule: Complete by December 20, 2005.

h. The permittee shall take measures to reduce fugitive PM emissions from Bulk Cement Loadout area. This area has been observed to experience visible dust emissions. Schedule: Evaluation of options no later than November 2005. The equipment associated with these improvements will be included in the 2006 Capital Improvement Plan to be implemented no later than the first half 2006.

i. The permittee shall make landscape upgrades to further enhance not only the aesthetics of the facility, but also to further decrease the wind erosion of unpaved areas. Schedule: To be developed.

j. Best Management Practices (BMPs) shall be implemented to minimize fugitive PM emissions from outside raw material storage piles (i.e., bauxite, fly ash, iron ore, etc.). The BMPs to be implemented are below:

i. Raw material inventory shall be managed to minimize the time in storage;

ii. Unloading and reclaiming of materials shall be curtailed during windy or dry conditions;

iii. Drop heights of material shall be minimized;

iv. Posting and enforcing speed limits along haul roads leading to the storage areas; and,

v. Raw materials are normally high moisture content when received. Application of water or other dust suppressants shall be used as necessary to minimize visible emissions.

Schedule: Implement in October 2005.

k. The dust collector preventative maintenance crew developed an Operation and Maintenance (O&M) Program for all dust collectors at the facility. This will reduce the potential for dust collector malfunction and excess PM emissions. Schedule: The O&M Plan shall be implemented in August 2005.

l. Upgrades to the air slides on the package cement load-out and the new Packhouse shall be completed October 2005. This new system will eliminate a package load-out system designed and built in the early 1950's. Adjacent to this area a new clinker silo dust collecting system is being designed to improve dust collection for clinker handling. This will result in reducing fugitive dust emissions from these areas. Schedule: The equipment associated with these improvements will be included in the 2006 Capital Improvement Plan to be implemented no later than the second quarter 2006.

m. The permittee shall upgrade the finish mill systems. This will include installing a new finish mill (No. 6) and a dust suppression system. Once this system is in operation, one of the old finish mill systems will be permanently shut down. Schedule: Implement by October 2005 with completion by December of 2005.

The permittee shall submit quarterly progress reports to include a status report on each specific action implemented under this Appendix, **Conditions a through m.** The first quarterly report shall be submitted in January 2006, with updates every 3 months thereafter for a two-year period. The progress reports shall be submitted to the compliance authority (Miami-Dade County DERM) with copies to the SED Air Program and the Bureau of Air Regulation.

[Rule 62-296.320(4)(c)2., F.A.C., Rule 62-4.070(3), F.A.C.; Application received April 18, 2005; and, Fugitive Dust Improvement Plan dated August 19, 2005.]

SECTION IV APPENDIX E

NSPS – SUBPART A, GENERAL PROVISIONS REQUIREMENTS

This facility is subject to all applicable New Source Performance Standards (NSPS) in 40 CFR 60 and adopted by reference in Rule 62-204.800(7)(b), F.A.C.

40 CFR 60, Subpart A - NSPS General Provisions

The emission units covered under this permit shall comply with all the applicable General Provisions of Subpart A in the New Source Performance Standards including 40 CFR 60.7 (Notification and Record Keeping), 40 CFR 60.8 (Performance Tests), 40 CFR 60.11 (Compliance with Standards and Maintenance Requirements), 40 CFR 60.12 (Circumvention), 40 CFR 60.13 (Monitoring Requirements), and 40 CFR 60.19 (General Notification and Reporting Requirements). The General Provisions are included in this permit.

NESHAP – SUBPART A, GENERAL PROVISIONS REQUIREMENTS

This facility is subject to all applicable National Emissions Standards for Hazardous Air Pollutants (NESHAP) for Source Category in 40 CFR 63 and adopted by reference in Rule 62-204.800(7)(b), F.A.C.

40 CFR 63, Subpart A - NESHAPS General Provisions

The emission units covered under this permit shall comply with all the applicable General Provisions of Subpart A in the National Emissions Standards for Hazardous Air Pollutants including 40 CFR 63.4 (Circumvention) , 40 CFR 63.5 (General Notification and Reporting Requirements, 40 CFR 63.6 (Compliance with Standards and Maintenance Requirements), 40 CFR 63.7 (Performance Tests), 40 CFR 63.8 (Monitoring Requirements), 40 CFR 63.9 (Notification Requirements), 40 CFR 63.10 (RecordKeeping and Reporting Requirements) and 40 CFR 63.11 (Control Device Requirements). The General Provisions are part of this permit.

APPENDIX G
40 CFR 60 Subpart F - Standards of Performance for Portland Cement Plants

[Last Updated: 2/7/02]
{Source: Federal Register dated 7/1/98, Revised 2/7/02 to reflect FR 10/17/00]

§ 60.60 Applicability and designation of affected facility.

(a) The provisions of this subpart are applicable to the following affected facilities in portland cement plants: Kiln, clinker cooler, raw mill system, finish mill system, raw mill dryer, raw material storage, clinker storage, finished product storage, conveyor transfer points, bagging and bulk loading and unloading systems.

(b) Any facility under paragraph (a) of this section that commences construction or modification after August 17, 1971, is subject to the requirements of this subpart.
[42 FR 37936, July 25, 1977]

§ 60.61 Definitions.

As used in this subpart, all terms not defined herein shall have the meaning given them in the Act and in subpart A of this part.
(a) *Portland cement plant* means any facility manufacturing portland cement by either the wet or dry process.

(b) *Bypass* means any system that prevents all or a portion of the kiln or clinker cooler exhaust gases from entering the main control device and ducts the gases through a separate control device. This does not include emergency systems designed to duct exhaust gases directly to the atmosphere in the event of a malfunction of any control device controlling kiln or clinker cooler emissions.

(c) *Bypass stack* means the stack that vents exhaust gases to the atmosphere from the bypass control device.

(d) *Monovent* means an exhaust configuration of a building or emission control device (e.g., positive- pressure fabric filter) that extends the length of the structure and has a width very small in relation to its length (i.e., length to width ratio is typically greater than 5:1). The exhaust may be an open vent with or without a roof, louvered vents, or a combination of such features.
[36 FR 24877, Dec. 23, 1971, as amended at 39 FR 20793, June 13, 1974; 53 FR 50363, Dec. 14, 1988]

§ 60.62 Standard for particulate matter.

(a) On and after the date on which the performance test required to be conducted by § 60.8 is completed, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any kiln any gases which:

(1) Contain particulate matter in excess of 0.15 kg per metric ton of feed (dry basis) to the kiln (0.30 lb per ton).

(2) Exhibit greater than 20 percent opacity.

(b) On and after the date on which the performance test required to be conducted by § 60.8 is completed, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any clinker cooler any gases which:

(1) Contain particulate matter in excess of 0.050 kg per metric ton of feed (dry basis) to the kiln (0.10 lb per ton).

(2) Exhibit 10 percent opacity, or greater.

On and after the date on which the performance test required to be conducted by § 60.8 is completed, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any affected facility other than the kiln and clinker cooler any gases which exhibit 10 percent opacity, or greater. [39 FR 20793, June 14, 1974, as amended at 39 FR 39874, Nov. 12, 1974; 40 FR 46258, Oct. 6, 1975]

§ 60.63 Monitoring of operations.

(a) The owner or operator of any portland cement plant subject to the provisions of this part shall record the daily production rates and kiln feed rates.

(b) Except as provided in paragraph (c) of this section, each owner or operator of a kiln or clinker cooler that is subject to the provisions of this subpart shall install, calibrate, maintain, and operate in accordance with § 60.13 a continuous opacity monitoring system to measure the opacity of emissions discharged into the atmosphere from any kiln or clinker cooler. Except as provided in paragraph

(c) of this section, a continuous opacity monitoring system shall be installed on each stack of any multiple stack device controlling emissions from any kiln or clinker cooler. If there is a separate bypass installed, each owner or operator of a kiln or clinker cooler shall also install, calibrate, maintain, and operate a continuous opacity monitoring system on each bypass stack in addition to the main control device stack. Each owner or operator of an affected kiln or clinker cooler for which the performance test required under § 60.8 has been completed on or prior to December 14, 1988, shall install the continuous opacity monitoring system within 180 days after December 14, 1988.

(d) Each owner or operator of a kiln or clinker cooler subject to the provisions of this subpart using a positive-pressure fabric filter with multiple stacks, or a negative-pressure fabric filter with multiple stacks, or an electrostatic precipitator with multiple stacks may, in lieu of installing the continuous opacity monitoring system required by § 60.63(b), monitor visible emissions at least once per day by using a certified visible emissions observer. If the control device exhausts gases through a monovent, visible emission observations in lieu of a continuous opacity monitoring system are required. These observations shall be taken in accordance with EPA Method 9. Visible emissions shall be observed during conditions representative of normal operation. Observations shall be recorded for at least three 6-minute periods each day. In the event that visible emissions are observed for a number of emission sites from the control device with multiple stacks, Method 9 observations shall be recorded for the emission site with the highest opacity. All records of visible emissions shall be maintained for a period of 2 years.

(d) For the purpose of reports under § 60.65, periods of excess emissions that shall be reported are defined as all 6-minute periods during which the average opacity exceeds that allowed by § 60.62(a)(2) or § 60.62(b)(2).

(e) The provisions of paragraphs (a), (b), and (c) of this section apply to kilns and clinker coolers for which construction, modification, or reconstruction commenced after August 17, 1971.
[36 FR 24877, Dec. 23, 1971, as amended at 53 FR 50363, Dec. 14, 1988]

§ 60.64 Test methods and procedures.

(a) In conducting the performance tests required in § 60.8, the owner or operator shall use as reference methods and procedures the test methods in 40 CFR 60 Appendix A or other methods and procedures as specified in this section, except as provided in § 60.8(b).

) The owner or operator shall determine compliance with the particulate matter standard in § 60.62 as follows:

(1) The emission rate (E) of particulate matter shall be computed for each run using the following equation:

$$E=(c_s\ Qsd)/(P\ K)$$

where:
E = emission rate of particulate matter, kg/metric ton (lb/ton) of kiln feed.
C_s = concentration of particulate matter, g/dscm (gr/dscf).
Qsd = volumetric flow rate of effluent gas, dscm/hr (dscf/hr).
P = total kiln feed (dry basis) rate, metric ton/hr (ton/hr).
K = conversion factor, 1000 g/kg (7000 gr/lb).

(2) Method 5 shall be used to determine the particulate matter concentration (cs) and the volumetric flow rate (Qsd) of the effluent gas. The sampling time and sample volume for each run shall be at least 60 minutes and 0.85 dscm (30.0 dscf) for the kiln and at least 60 minutes and 1.15 dscm (40.6 dscf) for the clinker cooler.

(3) Suitable methods shall be used to determine the kiln feed rate (P), except fuels, for each run. Material balance over the production system shall be used to confirm the feed rate.

(4) Method 9 and the procedures in § 60.11 shall be used to determine opacity.
[54 FR 6666, Feb. 14, 1989]

§ 60.65 Recordkeeping and reporting requirements.

(a) Each owner or operator required to install a continuous opacity monitoring system under § 60.63(b) shall submit reports of excess emissions as defined in § 60.63(d). The content of these reports must comply with the requirements in § 60.7(c). Notwithstanding the provisions of § 60.7(c), such reports shall be submitted ...i-annually.

(b) Each owner or operator monitoring visible emissions under § 60.63(c) shall submit semi-annual reports of observed excess emissions as defined in § 60.63(d).

(c) Each owner or operator of facilities subject to the provisions of § 60.63(c) shall submit semi-annual reports of the malfunction information required to be recorded by § 60.7(b). These reports shall include the frequency, duration, and cause of any incident resulting in deenergization of any device controlling kiln emissions or in the venting of emissions directly to the atmosphere.

(d) The requirements of this section remain in force until and unless the Agency, in delegating enforcement authority to a State under section 111(c) of the Clean Air Act, 42 U.S.C. 7411, approves reporting requirements or an alternative means of compliance surveillance adopted by such States. In that event, affected sources within the State will be relieved of the obligation to comply with this section, provided that they comply with the requirements established by the State.
[53 FR 50364, Dec. 14, 1988]

§ 60.66 Delegation of authority.

(a) In delegating implementation and enforcement authority to a State under section 111(c) of the Act, the authorities contained in paragraph (b) of this section shall be retained by the Administrator and not transferred to a State.

(b) Authorities which will not be delegated to States: No restrictions.

APPENDIX H
40 CFR 60, Subpart Y- Standards of Performance for Coal Preparation Plants

Updated 9/15/03

Source: Federal Register dated 1/15/76

§ 60.250 Applicability and designation of affected facility.

(a) The provisions of this subpart are applicable to any of the following affected facilities in coal preparation plants which process more than 181 Mg (200 tons) per day: Thermal dryers, pneumatic coal-cleaning equipment (air tables), coal processing and conveying equipment (including breakers and crushers), coal storage systems, and coal transfer and loading systems.

(b) Any facility under paragraph (a) of this section that commences construction or modification after October 24, 1974, is subject to the requirements of this subpart.

§ 60.251 Definitions.

As used in this subpart, all terms not defined herein have the meaning given them in the Act and in subpart A of this part.

(a) *Coal preparation plant* means any facility (excluding underground mining operations) which prepares coal by one or more of the following processes: breaking, crushing, screening, wet or dry cleaning, and thermal drying.

(b) *Bituminous coal* means solid fossil fuel classified as bituminous coal by ASTM Designation D388-77, 90, 91, 95, or 98a (incorporated by reference -- see § 60.17).

(c) *Coal* means all solid fossil fuels classified as anthracite, bituminous, subbituminous, or lignite by ASTM Designation D388-77, 90, 91, 95, or 98a (incorporated by reference -- see § 60.17).

(d) *Cyclonic flow* means a spiraling movement of exhaust gases within a duct or stack.

(e) *Thermal dryer* means any facility in which the moisture content of bituminous coal is reduced by contact with a heated gas stream which is exhausted to the atmosphere.

(f) *Pneumatic coal-cleaning equipment* means any facility which classifies bituminous coal by size or separates bituminous coal from refuse by application of air stream(s).

(g) *Coal processing and conveying equipment* means any machinery used to reduce the size of coal or to separate coal from refuse, and the equipment used to convey coal to or remove coal and refuse from the machinery. This includes, but is not limited to, breakers, crushers, screens, and conveyor belts.

(h) *Coal storage system* means any facility used to store coal except for open storage piles.

(i) *Transfer and loading system* means any facility used to transfer and load coal for shipment.

APPENDIX H

40 CFR 60, Subpart Y- Standards of Performance for Coal Preparation Plants

§ 60.252 Standards for particulate matter.

(a) On and after the date on which the performance test required to be conducted by § 60.8 is completed, an owner or operator subject to the provisions of this subpart shall not cause to be discharged into the atmosphere from any thermal dryer gases which:

(1) Contain particulate matter in excess of 0.070 g/dscm (0.031 gr/dscf).

(2) Exhibit 20 percent opacity or greater.

(b) On and after the date on which the performance test required to be conducted by § 60.8 is completed, an owner or operator subject to the provisions of this subpart shall not cause to be discharged into the atmosphere from any pneumatic coal cleaning equipment, gases which:

(1) Contain particulate matter in excess of 0.040 g/dscm (0.017 gr/dscf).

(2) Exhibit 10 percent opacity or greater.

(c) On and after the date on which the performance test required to be conducted by § 60.8 is completed, an owner or operator subject to the provisions of this subpart shall not cause to be discharged into the atmosphere from any coal processing and conveying equipment, coal storage system, or coal transfer and loading system processing coal, gases which exhibit 20 percent opacity or greater.

§ 60.253 Monitoring of operations.

(a) The owner or operator of any thermal dryer shall install, calibrate, maintain, and continuously operate monitoring devices as follows:

(1) A monitoring device for the measurement of the temperature of the gas stream at the exit of the thermal dryer on a continuous basis. The monitoring device is to be certified by the manufacturer to be accurate within ±1.7 °C (±3 °F).

(2) For affected facilities that use venturi scrubber emission control equipment:

(i) A monitoring device for the continuous measurement of the pressure loss through the venturi constriction of the control equipment. The monitoring device is to be certified by the manufacturer to be accurate within ±1 inch water gauge.

(ii) A monitoring device for the continuous measurement of the water supply pressure to the control equipment. The monitoring device is to be certified by the manufacturer to be accurate within ±5 percent of design water supply pressure. The pressure sensor or tap must be located close to the water discharge point. The Administrator may be consulted for approval of alternative locations.

(b) All monitoring devices under paragraph (a) of this section are to be recalibrated annually in accordance with procedures under § 60.13(b).

§ 60.254 Test methods and procedures.

(a) In conducting the performance tests required in § 60.8, the owner or operator shall use as reference methods and procedures the test methods in appendix A of this part or other methods and procedures as specified in this section, except as provided in § 60.8(b).

(b) The owner or operator shall determine compliance with the particular matter standards in § 60.252 as follows:

(1) Method 5 shall be used to determine the particulate matter concentration. The sampling time and sample volume for each run shall be at least 60 minutes and 0.85 dscm (30 dscf). Sampling shall begin no less than 30 minutes after startup and shall terminate before shutdown procedures begin.

(2) Method 9 and the procedures in § 60.11 shall be used to determine opacity.

APPENDIX I

40 CFR 63, Subpart LLL - National Emission Standards for Hazardous Air Pollutants from the Portland Cement Manufacturing Industry- Major Sources

{Last updated 6/27/03}

Section

GENERAL

EMISSION STANDARDS AND OPERATING LIMITS

MONITORING AND COMPLIANCE PROVISIONS

NOTIFICATION, REPORTING AND RECORDKEEPING

OTHER

Subpart LLL - National Emission Standards for Hazardous Air Pollutants from the Portland Cement Manufacturing Industry

§63.1340 Applicability and designation of affected sources.

(a) Except as specified in paragraphs (b) and (c) of this section, the provisions of this subpart apply to each new and existing portland cement plant which is a major source source as defined in §63.2.

(b) The affected sources subject to this subpart are:

(1) Each kiln and each in-line kiln/raw mill at any major source, including alkali bypasses, except for kilns and in-line kiln/raw mills that burn hazardous waste and are subject to and regulated under subpart EEE of this part;

(2) Each clinker cooler at any portland cement plant which is a major source;

(3) Each raw mill at any portland cement plant which is a major source;

(4) Each finish mill at any portland cement plant which is a major source;

(5) Each raw material dryer at any portland cement plant which is a major source and each greenfield raw material dryer at any portland cement plant which is a major source;

(6) Each raw material, clinker, or finished product storage bin at any portland cement plant which is a major source;

(7) Each conveying system transfer point including those associated with coal preparation used to conveycoal from the mill to the kiln at any portland cement plant which is a major source;

(8) Each bagging system at any portland cement plant which is a major source; and

(c) For portland cement plants with on-site nonmetallic mineral processing facilities, the first affected source in the sequence of materials handling operations subject to this subpart is the raw material storage, which is just prior to the raw mill. Any equipment of the on-site nonmetallic mineral processing plant which precedes the raw material storage is not subject to this subpart. In addition, the primary and secondary crushers of the on-site nonmetallic mineral processing plant, regardless of whether they precede the raw material storage, are not subject to this subpart. Furthermore, the first conveyor transfer point subject to this subpart is the transfer point associated with the conveyor transferring material from the raw material storage to the raw mill.

(d) The owner or operator of any affected source subject to the provisions of this subpart is subject to title V permitting requirements.

§63.1341 Definitions.

All terms used in this subpart that are not defined below have the meaning given to them in the CAA and in 40 CFR 63 Subpart A.

Alkali bypass means a duct between the feed end of the kiln and the preheater tower through which a portion of the kiln exit gas stream is withdrawn and quickly cooled by air or water to avoid excessive buildup of alkali, chloride and/or sulfur on the raw feed. This may also be referred to as the "kiln exhaust gas bypass".

Bagging system means the equipment which fills bags with portland cement.

Bin means a manmade enclosure for storage of raw materials, clinker, or finished product prior to further processing at a Portland cement plant.

Clinker cooler means equipment into which clinker product leaving the kiln is placed to be cooled by air supplied by a forced draft or natural draft supply system.

Continuous monitor means a device which continuously samples the regulated parameter specified in §63.1350 of this subpart without interruption, evaluates the detector response at least once every 15 seconds, and computes and records the average value at least every 60 seconds, except during allowable periods of calibration and except as defined otherwise by the continuous emission monitoring system performance specifications in appendix B to part 60 of this chapter.

Conveying system means a device for transporting materials from one piece of equipment or location to another location within a facility. Conveying systems include but are not limited to the following: feeders, belt conveyors, bucket elevators and pneumatic systems.

Conveying system transfer point means a point where any material including but not limited to feed material, fuel, clinker or product, is transferred to or from a conveying system, or between separate parts of a conveying system.

Dioxins and furans (D/F) means tetra-, penta-, hexa-, hepta-, and octa- chlorinated dibenzo dioxins and furans.

Facility means all contiguous or adjoining property that is under common ownership or control, including properties that are separated only by a road or other public right-of-way.

Feed means the prepared and mixed materials, which include but are not limited to materials such as limestone, clay, shale, sand, iron ore, mill scale, cement kiln dust and flyash, that are fed to the kiln. Feed does not include the fuels used in the kiln to produce heat to form the clinker product.

Finish mill means a roll crusher, ball and tube mill or other size reduction equipment used to grind clinker to a fine powder. Gypsum and other materials may be added to and blended with clinker in a finish mill. The finish mill also includes the air separator associated with the finish mill.

Greenfield kiln, in-line kiln/raw mill, or *raw material dryer* means a kiln, in-line kiln/raw mill, or raw material dryer for which construction is commenced at a plant site (where no kilns and no in-line kiln/raw mills were in operation at any time prior to March 24, 1998) after March 24, 1998.

Hazardous waste is defined in §261.3 of this chapter.

In-line kiln/raw mill means a system in a portland cement production process where a dry kiln system is integrated with the raw mill so that all or a portion of the kiln exhaust gases are used to perform the drying operation of the raw mill, with no auxiliary heat source used. In this system the kiln is capable of operating without the raw mill operating, but the raw mill cannot operate without the kiln gases, and consequently, the raw mill does not generate a separate exhaust gas stream.

Kiln means a device, including any associated preheater or precalciner devices, that produces clinker by heating limestone and other materials for subsequent production of portland cement.

Kiln exhaust gas bypass means alkali bypass.

Monovent means an exhaust configuration of a building or emission control device (e. g. positive pressure fabric filter) that extends the length of the structure and has a width very small in relation to its length (i. e., length to width ratio is typically greater than 5:1). The exhaust may be an open vent with or without a roof, louvered vents, or a combination of such features.

New brownfield kiln, in-line kiln raw mill, or *raw material dryer* means a kiln, in-line kiln/raw mill or raw material dryer for which construction is commenced at a plant site (where kilns and/or in-line kiln/raw mills were in operation prior to March 24, 1998) after March 24, 1998.

One-minute average means the average of thermocouple or other sensor responses calculated at least every 60 seconds from responses obtained at least once during each consecutive 15 second period.

Portland cement plant means any facility manufacturing portland cement.

Raw material dryer means an impact dryer, drum dryer, paddle-equipped rapid dryer, air separator, or other equipment used to reduce the moisture content of feed materials.

Raw mill means a ball and tube mill, vertical roller mill or other size reduction equipment, that is not part of an in-line kiln/raw mill, used to grind feed to the appropriate size. Moisture may be added or removed from the feed during the grinding operation. If the raw mill is used to remove moisture from feed materials, it is also, by definition, a raw material dryer. The raw mill also includes the air separator associated with the raw mill.

Rolling average means the average of all one-minute averages over the averaging period.

Run average means the average of the one-minute parameter values for a run.

TEQ means the international method of expressing toxicity equivalents for dioxins and furans as defined in U.S. EPA, Interim Procedures for Estimating Risks Associated with Exposures to Mixtures of Chlorinated Dibenzo-p-dioxins and -dibenzofurans (CDDs and CDFs) and 1989 Update, March 1989.

EMISSION STANDARDS AND OPERATING LIMITS

§63.1342 Standards: General.

(a) Table 1 to this subpart provides cross references to the 40 CFR part 63, subpart A, general provisions, indicating the applicability of the general provisions requirements to subpart LLL.

(b) Table 1 of this section provides a summary of emission limits and operating limits of this subpart.

Table 1 to §63.1342. Emission Limits and Operating Limits.

Affected Source	Pollutant or Opacity	Emission and Operating Limit
All kilns and in-line kiln/raw mills at major sources (including alkali bypass)	PM	0.15 kg/Mg of feed (dry basis)
	Opacity	20 percent
All kilns and in-line kiln/raw mills at major sources (including alkali bypass)	D/F	0.20 ng TEQ/dscm or 0.40 ng TEQ/dscm when the average of the performance test run average particulate matter control device (PMCD) inlet temperatures is 204° C or less. [Corrected to 7 percent oxygen] Operate such that the three-hour rolling average PMCD inlet temperature is no greater than the temperature established at performance test. If activated carbon injection is used: Operate such that the three-hour rolling average activated carbon injection rate is no less than rate established at performance test. Operate such that either the carrier gas flow rate or carrier gas pressure drop exceeds the value established at performance test. Inject carbon of equivalent specifications to that used at performance test.
New greenfield kilns and in-line kiln/raw mills at major sources	THC	50 ppmvd, as propane, corrected to 7 percent oxygen
All clinker coolers at major sources	PM	0.050 kg/Mg of feed (dry basis)
	Opacity	10 percent
All raw mills and finish mills at major sources	Opacity	10 percent
New greenfield raw material dryers at major sources	THC	50 ppmvd, as propane, corrected to 7 percent oxygen
All raw material dryers and material handling points at major sources	Opacity	10 percent

§63.1343 Standards for kilns and in-line kiln/raw mills.

(a) *General.* The provisions in this section apply to each kiln, each in-line kiln/raw mill, and any alkali bypass associated with that kiln or in-line kiln/raw mill.

(b) *Existing, reconstructed, or new brownfield/major sources.* No owner or operator of an existing, reconstructed or new brownfield kiln or an existing, reconstructed or new brownfield in-line kiln/raw mill at a facility that is a major source subject to the provisions of this subpart shall cause to be discharged into the atmosphere from these affected sources, any gases which:

(1) Contain particulate matter (PM) in excess of 0.15 kg per Mg (0.30 lb per ton) of feed (dry basis) to the kiln. When there is an alkali bypass associated with a kiln or in-line kiln/raw mill, the combined particulate matter emissions from the kiln or in-line kiln/raw mill and the alkali bypass are subject to this emission limit.

(2) Exhibit opacity greater than 20 percent.

(3) Contain D/F in excess of:

(i) 0.20 ng per dscm (8.7×10^{-11} gr per dscf)(TEQ) corrected to seven percent oxygen; or

(ii) 0.40 ng per dscm (1.7×10^{-10} gr per dscf)(TEQ) corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the particulate matter control device is 204° C (400° F) or less.

(c) *Greenfield/major sources.* No owner or operator that commences construction of a greenfield kiln or greenfield inline kiln/raw mill at a facility which is a major source subject to the provisions of this subpart shall cause to be discharged into the atmosphere from these affected sources any gases which:

(1) Contain particulate matter in excess of 0.15 kg per Mg (0.30 lb per ton) of feed (dry basis) to the When there is an alkali bypass associated with a kiln or in-line kiln/raw mill, the combined particulate matter emissions from the kiln or in-line kiln/raw mill and the bypass stack are subject to this emission limit.

(2) Exhibit opacity greater than 20 percent.

(3) Contain D/F in excess of:

(i) 0.20 ng per dscm (8.7×10^{-11} gr per dscf)(TEQ) corrected to seven percent oxygen; or

(ii) 0.40 ng per dscm (1.7×10^{-10} gr per dscf)(TEQ) corrected to seven percent oxygen, when the average of the performance test run average temperatures at the inlet to the particulate matter control device is 204° C (400° F) or less.

(4) Contain total hydrocarbon (THC), from the main exhaust of the kiln or in-line kiln/raw mill, in excess of 50 ppmvd as propane, corrected to seven percent oxygen.

(d) [Reserved]

(e) [Reserved]

§63.1344 Operating Limits for kilns and in-line kiln/raw mills.

(a) The owner or operator of a kiln subject to a D/F emission limitation under §63.1343 must operate the kiln such that the temperature of the gas at the inlet to the kiln particulate matter control device (PMCD) and alkali bypass PMCD, if applicable, does not exceed the applicable temperature limit specified in paragraph (b) of this section. The owner or operator of an in-line kiln/raw mill subject to a D/F emission limitation under §63.1343 must operate the in-line kiln/raw mill, such that,

(1) When the raw mill of the in-line kiln/raw mill is operating, the applicable temperature limit for the main in-line kiln/raw mill exhaust, specified in paragraph (b) of this section and established during the performance test when the raw mill was operating is not exceeded.

(2) When the raw mill of the in-line kiln/raw mill is not operating, the applicable temperature limit for the main in-line kiln/raw mill exhaust, specified in paragraph (b) of this section and established during the performance test when the raw mill was not operating, is not exceeded.

(3) If the in-line kiln/raw mill is equipped with an alkali bypass, the applicable temperature limit for the alkali bypass specified in paragraph (b) of this section and established during the performance test, with or without the raw mill operating, is not exceeded.

(b) The temperature limit for affected sources meeting the limits of paragraph (a) of this section or paragraphs (a)(1) through (a)(3) of this section is determined in accordance with §63.1349(b)(3)(iv).

(c) The owner or operator of an affected source subject to a D/F emission limitation under §63.1343 that employs carbon injection as an emission control technique must operate the carbon injection system in accordance with paragraphs (c)(1) and (c)(2) of this section.

(1) The three-hour rolling average activated carbon injection rate shall be equal to or greater than the activated carbon injection rate determined in accordance with §63.1349(b)(3)(vi).

(2) The owner or operator shall either:

(i) Maintain the minimum activated carbon injection carrier gas flow rate, as a three-hour rolling average, based on the manufacturer's specifications. These specifications must be documented in the test plan developed in accordance with §63.7(c) of this part, or

(ii) Maintain the minimum activated carbon injection carrier gas pressure drop, as a three-hour rolling average, based on the manufacturer's specifications. These specifications must be documented in the test plan developed in accordance with §63.7(c).

(d) Except as provided in paragraph (e) of this section, the owner or operator of an affected source subject to a D/F emission limitation under §63.1343 that employs carbon injection as an emission control technique must specify and use the brand and type of activated carbon used during the performance test until a subsequent performance test is conducted, unless the site-specific performance test plan contains documentation of key parameters that affect adsorption and the owner or operator establishes limits based on those parameters, and the limits on these parameters are maintained.

(e) The owner or operator of an affected source subject to a D/F emission limitation under §63.1343 that employs carbon injection as an emission control technique may substitute, at any time, a different brand or type of activated carbon provided that the replacement has equivalent or improved properties compared to the activated carbon specified in the site-specific performance test plan and used in the performance test. The owner or operator must maintain documentation that the substitute activated carbon will provide the same or better level of control as the original activated carbon.

§63.1345 Standards for clinker coolers.

(a) No owner or operator of a new or existing clinker cooler at a facility which is a major source subject to the provisions of this subpart shall cause to be discharged into the atmosphere from the clinker cooler any gases which:

(1) Contain particulate matter in excess of 0.050 kg per Mg (0.10 lb per ton) of feed (dry basis) to the kiln.

(2) Exhibit opacity greater than ten percent.

[Reserved]

§63.1346 Standards for new and reconstructed raw material dryers.

(a) *Brownfield/major sources.* No owner or operator of a new or reconstructed brownfield raw material dryer at a facility which is a major source subject to this subpart shall cause to be discharged into the atmosphere from the new or reconstructed raw material dryer any gases which exhibit opacity greater than ten percent.

(b) [Reserved]

(c) *Greenfield/major sources.* No owner or operator of a greenfield raw material dryer at a facility which is a major source subject to this subpart shall cause to be discharged into the atmosphere from the greenfield raw material dryer any gases which:

(1) Contain THC in excess of 50 ppmvd, reported as propane, corrected to seven percent oxygen. .

(2) Exhibit opacity greater than ten percent.

§63.1347 Standards for raw and finish mills.

The owner or operator of each new or existing raw mill or finish mill at a facility which is a major source subject to the provisions of this subpart shall not cause to be discharged from the mill sweep or air separator air pollution control devices of these affected sources any gases which exhibit opacity in excess of ten percent.

1348 Standards for affected sources other than kilns; in-line kiln/raw mills; clinker coolers; new reconstructed raw material dryers; and raw and finish mills.

The owner or operator of each new or existing raw material, clinker, or finished product storage bin; conveying system transfer point; bagging system; and bulk loading or unloading system; and each existing raw material dryer, at a facility which is a major source subject to the provisions of this subpart shall not cause to be discharged any gases from these affected sources which exhibit opacity in excess of ten percent.

§63.1349 Performance Testing Requirements.

(a) The owner or operator of an affected source subject to this subpart shall demonstrate initial compliance with the emission limits of §63.1343 and §§63.1345 through 63.1348 using the test methods and procedures in paragraph (b) of this section and §63.7. Performance test results shall be documented in complete test reports that contain the information required by paragraphs (a)(1) through (a)(10) of this section, as well as all other relevant information. The plan to be followed during testing shall be made available to the Administrator prior to testing, if requested.

(1) A brief description of the process and the air pollution control system;

(2) Sampling location description(s);

(3) A description of sampling and analytical procedures and any modifications to standard procedures;

(4) Test results;

(5) Quality assurance procedures and results;

(6) Records of operating conditions during the test, preparation of standards, and calibration procedures;

(7) Raw data sheets for field sampling and field and laboratory analyses;
(8) Documentation of calculations;
(9) All data recorded and used to establish parameters for compliance monitoring; and
(10) Any other information required by the test method.

(b) Performance tests to demonstrate initial compliance with this subpart shall be conducted as specified in paragraphs (b)(1) through (b)(4) of this section.

(1) The owner or operator of a kiln subject to limitations on particulate matter emissions shall demonstrate initial compliance by conducting a performance test as specified in paragraphs (b)(1)(i) through (b)(1)(iv) of this section. The owner or operator of an in-line kiln/raw mill subject to limitations on particulate matter emissions shall demonstrate initial compliance by conducting separate performance tests as specified in paragraphs (b)(1)(i) through (b)(1)(iv) of this section while the raw mill of the in-line kiln/raw mill is under normal operating conditions and while the raw mill of the in-line kiln/raw mill is not operating. The owner or operator of a clinker cooler subject to limitations on particulate matter emissions shall demonstrate initial compliance by conducting a performance test as specified in paragraphs (b)(1)(i) through (b)(1)(iii) of this section. The opacity exhibited during the period of the Method 5 of Appendix A to part 60 of this chapter performance tests required by paragraph (b)(1)(i) of this section shall be determined as required in paragraphs (b)(1)(v) through (vi) of this section.

(i) Method 5 of appendix A to part 60 of this chapter shall be used to determine PM emissions. Each performance test shall consist of three separate runs under the conditions that exist when the affected source is operating at the representative performance conditions in accordance with Sec. 63.7(e). Each run shall be conducted for at least 1 hour, and the minimum sample volume shall be 0.85 dscm (30 dscf). The average of the three runs shall be used to determine compliance. A determination of the PM collected in the impingers (``back half'') of the Method 5 particulate sampling train is not required to demonstrate initial compliance with the PM standards of this subpart. However, this shall not preclude the [redacted]itting authority from requiring a determination of the ``back half'' for other purposes.

(ii) Suitable methods shall be used to determine the kiln or inline kiln/raw mill feed rate, except for fuels, for each run.

(iii) The emission rate, E, of PM shall be computed for each run using equation 1:

$$E = (c_s Q_{sd}) / P \qquad \textbf{(Eq 1)}$$

Where: E = emission rate of particulate matter, kg/Mg of kiln feed.
c_s = concentration of PM, kg/dscm.
Q_{sd} = volumetric flow rate of effluent gas, dscm/hr.
P = total kiln feed (dry basis), Mg/hr.

(iv) When there is an alkali bypass associated with a kiln or in-line kiln/raw mill, the main exhaust and alkali bypass of the kiln or in-line kiln/raw mill shall be tested simultaneously and the combined emission rate of particulate matter from the kiln or in-line kiln/raw mill and alkali bypass shall be computed for each run using equation 2,

$$E_c = (c_{sk}Q_{sdk} + c_{sb}Q_{sdb})/P \qquad \textbf{(Eq 2)}$$

Where: E_c = the combined emission rate of particulate matter from the kiln or in-line kiln/raw mill and bypass stack, kg/Mg of kiln feed.
c_{sk} = concentration of particulate matter in the kiln or in-line kiln/raw mill effluent, kg/dscm.
Q_{sdk} = volumetric flow rate of kiln or in-line kiln/raw mill effluent, dscm/hr.

c_{sb} = concentration of particulate matter in the alkali bypass gas, kg/dscm.
Q_{sdb} = volumetric flow rate of alkali bypass gas, dscm/hr.
P = total kiln feed (dry basis), Mg/hr.

(v) Except as provided in paragraph (b)(1)(vi) of this section the opacity exhibited during the period of the Method 5 performance tests required by paragraph (b)(1)(i) of this section shall be determined through the use of a continuous opacity monitor (COM). The maximum six-minute average opacity during the three Method 5 test runs shall be determined during each Method 5 test run, and used to demonstrate initial compliance with the applicable opacity limits of §63.1343(b)(2), §63.1343(c)(2), or §63.1345(a)(2).

(vi) Each owner or operator of a kiln, in-line kiln/raw mill, or clinker cooler subject to the provisions of this subpart using a fabric filter with multiple stacks or an electrostatic precipitator with multiple stacks may, in lieu of installing the continuous opacity monitoring system required by paragraph (b)(1)(v) of this section, conduct an opacity test in accordance with Method 9 of appendix A to part 60 of this chapter during each Method 5 performance test required by paragraph (b)(1)(i) of this section. If the control device exhausts through a monovent, or if the use of a COM in accordance with the installation specifications of Performance Specification 1 (PS-1) of appendix B to part 60 of this chapter is not feasible, a test shall be conducted in accordance with Method 9 of appendix A to part 60 of this chapter during each Method 5 performance test required by paragraph (b)(1)(i) of this section. The maximum six-minute average opacity shall be determined during the three Method 5 test runs, and used to demonstrate initial compliance with the applicable opacity limits of §63.1343(b)(2), §63.1343(c)(2), or §63.1345(a)(2).

(2) The owner or operator of any affected source subject to limitations on opacity under this subpart that is not subject to paragraph (b)(1) of this section shall demonstrate initial compliance with the affected source opacity limit by conducting a test in accordance with Method 9 of appendix A to part 60 of this chapter. The performance test shall be conducted under the conditions that exist when the affected source is operating at the representative performance conditions in accordance with Sec. 63.7(e). The maximum 6-minute average opacity exhibited during the test period shall be used to determine whether the affected source is in initial compliance with the standard. The duration of the Method 9 performance test shall be 3 hours (30 6-minute averages), except that the duration of the Method 9 performance test may be reduced to 1 hour if the conditions of paragraphs (b)(2)(i) through (ii) of this section apply:

(i) There are no individual readings greater than 10 percent opacity;

(ii) There are no more than three readings of 10 percent for the first 1-hour period.

(3) The owner or operator of an affected source subject to limitations on D/F emissions under this subpart shall demonstrate initial compliance with the D/F emission limit by conducting a performance test using Method 23 of appendix A to part 60 of this chapter. The owner or operator of an in-line kiln/raw mill shall demonstrate initial compliance by conducting separate performance tests while the raw mill of the in-line kiln/raw mill is under normal operating conditions and while the raw mill of the in-line kiln/raw mill is not operating. The owner or operator of a kiln or in-line kiln/raw mill equipped with an alkali bypass shall conduct simultaneous performance tests of the kiln or in-line kiln/raw mill exhaust and the alkali bypass. However, the owner or operator of an in-line kiln/raw mill may conduct a performance test of the alkali bypass exhaust when the raw mill of the in-line kiln/raw mill is operating or not operating.

(i) Each performance test shall consist of three separate runs; each run shall be conducted under the conditions that exist when the affected source is operating at the representative performance conditions in accordance with Sec. 63.7(e). The duration of each run shall be at least 3 hours, and the sample volume for each run shall be at least 2.5 dscm (90 dscf). The concentration shall be determined for each run, and the arithmetic average of the concentrations measured for the three runs shall be calculated and used to determine compliance.

(ii) The temperature at the inlet to the kiln or in-line kiln/raw mill PMCD, and where applicable, the temperature at the inlet to the alkali bypass PMCD, must be continuously recorded during the

iod of the Method 23 test, and the continuous temperature record(s) must be included in the performance test report.

(iii) One-minute average temperatures must be calculated for each minute of each run of the test.

(iv) The run average temperature must be calculated for each run, and the average of the run average temperatures must be determined and included in the performance test report and will determine the applicable temperature limit in accordance with §63.1344(b).

(v) If activated carbon injection is used for D/F control, the rate of activated carbon injection to the kiln or in-line kiln/raw mill exhaust, and where applicable, the rate of activated carbon injection to the alkali bypass exhaust, must be continuously recorded during the period of the Method 23 test, and the continuous injection rate record(s) must be included in the performance test report. In addition, the performance test report must include the brand and type of activated carbon used during the performance test and a continuous record of either the carrier gas flow rate or the carrier gas pressure drop for the duration of the test. Activated carbon injection rate parameters must be determined in accordance with paragraphs (b)(3)(vi) of this section.

(vi) The run average injection rate must be calculated for each run, and the average of the run average injection rates must be determined and included in the performance test report and will determine the applicable injection rate limit in accordance with §63.1344(c)(1).

(4) The owner or operator of an affected source subject to limitations on emissions of THC shall demonstrate initial compliance with the THC limit by operating a continuous emission monitor in accordance with Performance Specification 8A of appendix B to part 60 of this chapter. The duration of the performance test shall be three hours, and the average THC concentration (as calculated from the one-minute averages) during the three hour performance test shall be calculated. The owner or operator of an in-line kiln/raw mill shall demonstrate initial compliance by conducting separate performance tests while the raw mill of the in-line kiln/raw mill is under normal operating conditions and while the raw mill of the in-line kiln/raw mill is operating.

(c) Except as provided in paragraph (e) of this section, performance tests required under paragraphs (b)(1) and (b)(2) of this section shall be repeated every five years, except that the owner or operator of a kiln, in-line kiln/raw mill or clinker cooler is not required to repeat the initial performance test of opacity for the kiln, in-line kiln/raw mill or clinker cooler.

(d) Performance tests required under paragraph (b)(3) of this section shall be repeated every 30 months.

(e) (1) IIf a source plans to undertake a change in operations that may adversely affect compliance with an applicable D/F standard under this subpart, the source must conduct a performance test and establish new temperature limit(s) as specified in paragraph (b)(3) of this section.

(2) If a source plans to undertake a change in operations that may adversely affect compliance with an applicable PM standard under Sec. 63.1343, the source must conduct a performance test as specified in paragraph (b)(1) of this section.

Table 1 of this section provides a summary of the performance test requirements of this subpart.

TABLE 1 to §63.1349. SUMMARY OF PERFORMANCE TEST REQUIREMENTS

Affected source and pollutant	Performance Test
New and existing kiln and in-line kiln/raw mill[b,c] PM	EPA Method 5[a]
New and existing kiln and in-line kiln/raw mill[b,c] Opacity	COM if feasible[d,e] or EPA Method 9 visual opacity readings.
New and existing kiln and in-line kiln/raw mill[b,c,f,g] D/F	EPA Method 23[h]
New greenfield kiln and in-line kiln/raw mill[c] THC	THC CEM (EPA PS-8A)[f]
New and existing clinker cooler PM	EPA Method 5[a]
New and existing clinker cooler opacity	COM[d,j] or EPA Method 9 visual opacity readings
New and existing raw and finish mill opacity	EPA Method 9[a,j]
New and existing raw material dryer and materials handling processes (raw material storage, clinker storage, finished product storage, conveyor transfer points, bagging, and bulk loading and unloading systems) opacity	EPA Method 9[a,j]
New greenfield raw material dryer THC	THC CEM (EPA PS-8A)[i]

[a] Required initially and every 5 years thereafter.
[b] Includes main exhaust and alkali bypass.
[c] In-line kiln/raw mill to be tested with and without raw mill in operation.
[d] Must meet COM performance specification criteria. If the fabric filter or electrostatic precipitator has multiple stacks, daily EPA Method 9 visual opacity readings may be taken instead of using a COM.
[e] Opacity limit is 20 percent.
[f] Alkali bypass is tested with the raw mill operating or not operating.
[g] Temperature and (if applicable) activated carbon injection parameters determined separately with and without the raw mill operating.
[h] Required initially and every 30 months thereafter.
[i] EPA Performance Specification (PS)-8A of appendix B to part 60 of this chapter.
[j] Opacity limit is 10 percent.

(3) In preparation for and while conducting a performance test required in paragraph (e)(1) of this section, a source may operate under the planned operational change conditions for a period not to exceed 360 hours, provided that the conditions in paragraphs (e)(3)(i) through (iv) of this section are met. The source shall submit temperature and other monitoring data that are recorded during the pretest operations.

(i) The source must provide the Administrator written notice at least 60 days prior to undertaking an operational change that may adversely affect compliance with an applicable standard under this subpart, or as soon as practicable where 60 days advance notice is not feasible. Notice provided under this

agraph shall include a description of the planned change, the emissions standards that may be affected by the change, and a schedule for completion of the performance test required under paragraph (e)(1) of this section, including when the planned operational change period would begin.

(ii) The performance test results must be documented in a test report according to paragraph (a) of this section.

(iii) A test plan must be made available to the Administrator prior to testing, if requested.

(iv) The performance test must be conducted, and it must be completed within 360 hours after the planned operational change period begins.

§63.1350 Monitoring requirements.

(a) The owner or operator of each portland cement plant shall prepare for each affected source subject to the provisions of this subpart, a written operations and maintenance plan. The plan shall be submitted to the Administrator for review and approval as part of the application for a part 70 permit and shall include the following information:

(1) Procedures for proper operation and maintenance of the affected source and air pollution control devices in order to meet the emission limits and operating limits of §§63.1343 through 63.1348;

(2) Corrective actions to be taken when required by paragraph (e) of this section;

(3) Procedures to be used during an inspection of the components of the combustion system of each kiln and each in-line kiln raw mill located at the facility at least once per year; and

(4) Procedures to be used to periodically monitor affected sources subject to opacity standards under §§63.1346 and 63.1348. Such procedures must include the provisions of paragraphs (a)(4)(i) through (a)(4)(iv) of this section.

(i) The owner or operator must conduct a monthly 1-minute visible emissions test of each affected source in accordance with Method 22 of Appendix A to part 60 of this chapter. The test must be ucted while the affected source is in operation.

(ii) If no visible emissions are observed in six consecutive monthly tests for any affected source, the owner or operator may decrease the frequency of testing from monthly to semi-annually for that affected source. If visible emissions are observed during any semi-annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iii) If no visible emissions are observed during the semi-annual test for any affected source, the owner or operator may decrease the frequency of testing from semi-annually to annually for that affected source. If visible emissions are observed during any annual test, the owner or operator must resume testing of that affected source on a monthly basis and maintain that schedule until no visible emissions are observed in six consecutive monthly tests.

(iv) If visible emissions are observed during any Method 22 test, the owner or operator must conduct a 6-minute test of opacity in accordance with Method 9 of appendix A to part 60 of this chapter. The Method 9 test must begin within one hour of any observation of visible emissions.

(v) The requirement to conduct Method 22 visible emissions monitoring under this paragraph shall not apply to any totally enclosed conveying system transfer point, regardless of the location of the transfer point. "Totally enclosed conveying system transfer point" shall mean a conveying system transfer point that is enclosed on all sides, top, and bottom. The enclosures for these transfer points shall be operated and maintained as total enclosures on a continuing basis in accordance with the facility operations and maintenance plan.

(vi) If any partially enclosed or unenclosed conveying system transfer point is located in a building, the owner or operator of the portland cement plant shall have the option to conduct a Method 22 visible emissions monitoring test according to the requirements of paragraphs (a)(4)(i) through (iv) of this

tion for each such conveying system transfer point located within the building, or for the building itself, according to paragraph (a)(4)(vii) of this section.

(vii) If visible emissions from a building are monitored, the requirements of paragraphs (a)(4)(i) through (iv) of this section apply to the monitoring of the building, and you must also test visible emissions from each side, roof and vent of the building for at least 1 minute. The test must be conducted under normal operating conditions.

(b) Failure to comply with any provision of the operations and maintenance plan developed in accordance with paragraph (a) of this section shall be a violation of the standard.

(c) The owner or operator of a kiln or in-line kiln/raw mill shall monitor opacity at each point where emissions are vented from these affected sources including alkali bypasses in accordance with paragraphs (c)(1) through (c)(3) of this section.

(1) Except as provided in paragraph (c)(2) of this section, the owner or operator shall install, calibrate, maintain, and continuously operate a continuous opacity monitor (COM) located at the outlet of the PM control device to continuously monitor the opacity. The COM shall be installed, maintained, calibrated, and operated as required by subpart A, general provisions of this part, and according to PS-1 of appendix B to part 60 of this chapter.

(2) The owner or operator of a kiln or in-line kiln/raw mill subject to the provisions of this subpart using a fabric filter with multiple stacks or an electrostatic precipitator with multiple stacks may, in lieu of installing the continuous opacity monitoring system required by paragraph (c)(1) of this section, monitor opacity in accordance with paragraphs (c)(2)(i) through (ii) of this section. If the control device exhausts through a monovent, or if the use of a COM in accordance with the installation specifications of PS-1 of appendix B to part 60 of this chapter is not feasible, the owner or operator must monitor opacity in accordance with paragraphs (c)(2)(i) through (ii) of this section.

(i) Perform daily visual opacity observations of each stack in accordance with the procedures of Method 9 of appendix A to part 60 of this chapter. The Method 9 test shall be conducted while the affected source is operating at the representative performance conditions. The duration of the Method 9 test shall be at least 30 minutes each day.

(ii) Use the Method 9 procedures to monitor and record the average opacity for each six-minute period during the test.

(3) To remain in compliance, the opacity must be maintained such that the 6-minute average opacity for any 6-minute block period does not exceed 20 percent. If the average opacity for any 6-minute block period exceeds 20 percent, this shall constitute a violation of the standard.

(d) The owner or operator of a clinker cooler shall monitor opacity at each point where emissions are vented from the clinker cooler in accordance with paragraphs (d)(1) through (d)(3) of this section.

(1) Except as provided in paragraph (d)(2) of this section, the owner or operator shall install, calibrate, maintain, and continuously operate a COM located at the outlet of the clinker cooler PM control device to continuously monitor the opacity. The COM shall be installed, maintained, calibrated, and operated as required by subpart A, general provisions of this part, and according to PS-1 of appendix B to part 60 of this chapter.

(2) The owner or operator of a clinker cooler subject to the provisions of this subpart using a fabric filter with multiple stacks or an electrostatic precipitator with multiple stacks may, in lieu of installing the continuous opacity monitoring system required by paragraph (d)(1) of this section, monitor opacity in accordance with paragraphs (d)(2)(i) through (ii) of this section. If the control device exhausts through a monovent, or if the use of a COM in accordance with the installation specifications of PS-1 of appendix B to part 60 of this chapter is not feasible, the owner or operator must monitor opacity in accordance with paragraphs (d)(2)(i) through (ii) of this section.

(i) Perform daily visual opacity observations of each stack in accordance with the procedures of Method 9 of appendix A to part 60 of this chapter. The Method 9 test shall be conducted while the affected source is operating at the representative performance conditions. The duration of the Method 9 test shall be at least 30 minutes each day.

(ii) Use the Method 9 procedures to monitor and record the average opacity for each six-minute period during the test.

(3) To remain in compliance, the opacity must be maintained such that the 6-minute average opacity for any 6-minute block period does not exceed 10 percent. If the average opacity for any 6-minute block period exceeds 10 percent, this shall constitute a violation of the standard.

(e) The owner or operator of a raw mill or finish mill shall monitor opacity by conducting daily visual emissions observations of the mill sweep and air separator PMCD of these affected sources in accordance with the procedures of Method 22 of appendix A to part 60 of this chapter. The Method 22 test shall be conducted while the affected source is operating at the representative performance conditions. The duration of the Method 22 test shall be 6 minutes. If visible emissions are observed during any Method 22 visible emissions test, the owner or operator must:

(1) Initiate, within one-hour, the corrective actions specified in the site specific operating and maintenance plan developed in accordance with paragraphs (a)(1) and (a)(2) of this section; and

(2) Within 24 hours of the end of the Method 22 test in which visible emissions were observed, conduct a follow up Method 22 test of each stack from which visible emissions were observed during the previous Method 22 test. If visible emissions are observed during the followup Method 22 test from any stack from which visible emissions were observed during the previous Method 22 test, conduct a visual opacity test of each stack from which emissions were observed during the follow up Method 22 test in accordance with Method 9 of appendix A to part 60 of this chapter. The duration of the Method 9 test shall be 30 minutes.

The owner or operator of an affected source subject to a limitation on D/F emissions shall monitor D/F emissions in accordance with paragraphs (f)(1) through (f)(6) of this section.

(1) The owner or operator shall install, calibrate, maintain, and continuously operate a continuous monitor to record the temperature of the exhaust gases from the kiln, in-line kiln/raw mill and alkali bypass, if applicable, at the inlet to, or upstream of, the kiln, in-line kiln/raw mill and/or alkali bypass PM control devices.

(i) The recorder response range must include zero and 1.5 times either of the average temperatures established according to the requirements in §63.1349(b)(3)(iv).

(ii) The reference method must be a National Institute of Standards and Technology calibrated reference thermocouple-potentiometer system or alternate reference, subject to approval by the Administrator.

(2) The owner or operator shall monitor and continuously record the temperature of the exhaust gases from the kiln, in-line kiln/raw mill and alkali bypass, if applicable, at the inlet to the kiln, in-line kiln/raw mill and/or alkali bypass PMCD.

(3) The three-hour rolling average temperature shall be calculated as the average of 180 successive one-minute average temperatures.

(4) Periods of time when one-minute averages are not available shall be ignored when calculating three-hour rolling averages. When one-minute averages become available, the first one-minute average is added to the previous 179 values to calculate the three-hour rolling average.

(5) When the operating status of the raw mill of the in-line kiln/raw mill is changed from off to on, or from on to off the calculation of the three-hour rolling average temperature must begin anew, without considering previous recordings.

(6) The calibration of all thermocouples and other temperature sensors shall be verified at least once every three months.

(g) The owner or operator of an affected source subject to a limitation on D/F emissions that employs carbon injection as an emission control technique shall comply with the monitoring requirements of paragraphs (f)(1) through (f)(6) and (g)(1) through (g)(6) of this section to demonstrate continuous compliance with the D/F emission standard.

(1) Install, operate, calibrate and maintain a continuous monitor to record the rate of activated carbon injection. The accuracy of the rate measurement device must be ± 1 percent of the rate being measured.

(2) Verify the calibration of the device at least once every three months.

(3) The three-hour rolling average activated carbon injection rate shall be calculated as the average of 180 successive one-minute average activated carbon injection rates.

(4) Periods of time when one-minute averages are not available shall be ignored when calculating three-hour rolling averages. When one-minute averages become available, the first one-minute average is added to the previous 179 values to calculate the three-hour rolling average.

(5) When the operating status of the raw mill of the in-line kiln/raw mill is changed from off to on, or from on to off the calculation of the three-hour rolling average activated carbon injection rate must begin anew, without considering previous recordings.

(6) The owner or operator must install, operate, calibrate and maintain a continuous monitor to record the activated carbon injection system carrier gas parameter (either the carrier gas flow rate or the carrier gas pressure drop) established during the D/F performance test in accordance with paragraphs (g)(6)(i) through (g)(6)(iii) of this section.

(i) The owner or operator shall install, calibrate, operate and maintain a device to continuously monitor and record the parameter value.

(ii) The owner or operator must calculate and record three-hour rolling averages of the parameter value.

(iii) Periods of time when one-minute averages are not available shall be ignored when calculating three-hour rolling averages. When one-minute averages become available, the first one-minute average shall be added to the previous 179 values to calculate the three-hour rolling average.

(h) The owner or operator of an affected source subject to a limitation on THC emissions under this subpart shall comply with the monitoring requirements of paragraphs (h)(1) through (h)(3) of this section to demonstrate continuous compliance with the THC emission standard:

(1) The owner or operator shall install, operate and maintain a THC continuous emission monitoring system in accordance with Performance Specification 8A, of appendix B to part 60 of this chapter and comply with all of the requirements for continuous monitoring systems found in the general provisions, subpart A of this part.

(2) The owner or operator is not required to calculate hourly rolling averages in accordance with section 4.9 of Performance Specification 8A.

(3) Any thirty-day block average THC concentration in any gas discharged from a greenfield raw material dryer, the main exhaust of a greenfield kiln, or the main exhaust of a greenfield in-line kiln/raw mill, exceeding 50 ppmvd, reported as propane, corrected to seven percent oxygen, is a violation of the standard.

(i) The owner or operator of any kiln or in-line kiln/raw mill subject to a D/F emission limit under this subpart shall conduct an inspection of the components of the combustion system of each kiln or in-line kiln raw mill at least once per year.

(j) The owner or operator of an affected source subject to a limitation on opacity under §63.1346 or §63.1348 shall monitor opacity in accordance with the operation and maintenance plan developed in accordance with paragraph (a) of this section.

(k) The owner or operator of an affected source subject to a particulate matter standard under §63.1343 shall install, calibrate, maintain and operate a particulate matter continuous emission monitoring system (PM CEMS) to measure the particulate matter discharged to the atmosphere. All requirements relating to installation, calibration, maintenance, operation or performance of the PM CEMS and implementation of the PM CEMS requirement are deferred pending further rulemaking.

(l) An owner or operator may submit an application to the Administrator for approval of alternate monitoring requirements to demonstrate compliance with the emission standards of this subpart, except for emission standards for THC, subject to the provisions of paragraphs (l)(1) through (l)(6) of this section.

(1) The Administrator will not approve averaging periods other than those specified in this section, unless the owner or operator documents, using data or information, that the longer averaging period will ensure that emissions do not exceed levels achieved during the performance test over any increment of time equivalent to the time required to conduct three runs of the performance test.

(2) If the application to use an alternate monitoring requirement is approved, the owner or operator must continue to use the original monitoring requirement until approval is received to use another monitoring requirement.

(3) The owner or operator shall submit the application for approval of alternate monitoring requirements no later than the notification of performance test. The application must contain the information specified in paragraphs (l)(3)(i) through (l)(3)(iii) of this section:

(i) Data or information justifying the request, such as the technical or economic infeasibility, or the impracticality of using the required approach;

(ii) A description of the proposed alternative monitoring requirement, including the operating parameter to be monitored, the monitoring approach and technique, the averaging period for the limit, and how the limit is to be calculated; and

(iii) Data or information documenting that the alternative monitoring requirement would provide equivalent or better assurance of compliance with the relevant emission standard.

(4) The Administrator will notify the owner or operator of the approval or denial of the application within 90 calendar days after receipt of the original request, or within 60 calendar days of the receipt of any supplementary information, whichever is later. The Administrator will not approve an alternate monitoring application unless it would provide equivalent or better assurance of compliance with the relevant emission standard. Before disapproving any alternate monitoring application, the Administrator will provide:

(i) Notice of the information and findings upon which the intended disapproval is based; and

(ii) Notice of opportunity for the owner or operator to present additional supporting information before final action is taken on the application. This notice will specify how much additional time is allowed for the owner or operator to provide additional supporting information.

(5) The owner or operator is responsible for submitting any supporting information in a timely manner to enable the Administrator to consider the application prior to the performance test. Neither submittal of an application, nor the Administrator's failure to approve or disapprove the application relieves the owner or operator of the responsibility to comply with any provision of this subpart.

(6) The Administrator may decide at any time, on a case-by-case basis that additional or alternative operating limits, or alternative approaches to establishing operating limits, are necessary to demonstrate compliance with the emission standards of this subpart.

(m) The requirements under paragraph (e) of this section to conduct daily Method 22 testing shall not apply to any specific raw mill or finish mill equipped with a continuous opacity monitor COM or bag leak detection system (BLDS). If the owner or operator chooses to install a COM in lieu of conducting the daily visual emissions testing required under paragraph (e) of this section, then the COM must be installed at the outlet of the PM control device of the raw mill or finish mill, and the COM must be installed, maintained, calibrated,

operated as required by the general provisions in subpart A of this part and according to PS-1 of appendix B to part 60 of this chapter. To remain in compliance, the opacity must be maintained such that the 6-minute average opacity for any 6-minute block period does not exceed 10 percent. If the average opacity for any 6-minute block period exceeds 10 percent, this shall constitute a violation of the standard. If the owner or operator chooses to install a BLDS in lieu of conducting the daily visual emissions testing required under paragraph (e) of this section, the requirements in paragraphs (m)(1) through (9) of this section apply to each BLDS:

(1) The BLDS must be certified by the manufacturer to be capable of detecting PM emissions at concentrations of 10 milligrams per actual cubic meter (0.0044 grains per actual cubic foot) or less. ``Certify" shall mean that the instrument manufacturer has tested the instrument on gas streams having a range of particle size distributions and confirmed by means of valid filterable PM tests that the minimum detectable concentration limit is at or below 10 milligrams per actual cubic meter (0.0044 grains per actual cubic foot) or less.

(2) The sensor on the BLDS must provide output of relative PM emissions.

(3) The BLDS must have an alarm that will activate automatically when it detects a significant increase in relative PM emissions greater than a preset level.

(4) The presence of an alarm condition should be clearly apparent to facility operating personnel.

(5) For a positive-pressure fabric filter, each compartment or cell must have a bag leak detector. For a negative-pressure or induced-air fabric filter, the bag leak detector must be installed downstream of the fabric filter. If multiple bag leak detectors are required (for either type of fabric filter), detectors may share the system instrumentation and alarm.

(6) All BLDS must be installed, operated, adjusted, and maintained so that they are based on the manufacturer's written specifications and recommendations. The EPA recommends that where appropriate, the standard operating procedures manual for each bag leak detection system include concepts from EPA's "Fabric Filter Bag Leak Detection Guidance" (EPA-454/R-98-015, September 1997).

(7) The baseline output of the system must be established as follows:

(i) Adjust the range and the averaging period of the device; and

(ii) Establish the alarm set points and the alarm delay time.

(8) After initial adjustment, the range, averaging period, alarm set points, or alarm delay time may not be adjusted except as specified in the operations and maintenance plan required by paragraph (a) of this section. In no event may the range be increased by more than 100 percent or decreased by more than 50 percent over a 1 calendar year period unless a responsible official as defined in Sec. 63.2 certifies in writing to the Administrator that the fabric filter has been inspected and found to be in good operating condition.

(9) The owner or operator must maintain and operate the fabric filter such that the bag leak detector alarm is not activated and alarm condition does not exist for more than 5 percent of the total operating time in a 6-month block period. Each time the alarm activates, alarm time will be counted as the actual amount of time taken by the owner or operator to initiate corrective actions. If inspection of the fabric filter demonstrates that no corrective actions are necessary, no alarm time will be counted. The owner or operator must continuously record the output from the BLDS during periods of normal operation. Normal operation does not include periods when the BLDS is being maintained or during startup, shutdown or malfunction.

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Clinker Handling and Storage

3. Emissions Unit Identification Number: **027**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Emission unit consists of Clinker Handling and Storage systems for the Pyroprocessing Operation and Clinker Silos 2, 5, 12, 17-21, 23, 26, and 28.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (9)

   Process Enclosures

2. Control Device or Method Code(s): **018, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **250 TPH (24-hour block average)**	
2. Maximum Production Rate: **2,190,000 TPY of Clinker**	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 027**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **9 baghouse stacks. See Attachment TM-EU2-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **H**	6. Stack Height: **113** feet	7. Exit Diameter: **2.6** feet
8. Exit Temperature: **250** °F	9. Actual Volumetric Flow Rate: **18,700** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: **13,906** dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Data presented above reflects Baghouse 481.BF730. Diameter represents equivalent diameter for rectangular stack. Refer to Attachment TM-EU2-C15 for stack parameters for other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Clinker Transfer.**		
2. Source Classification Code (SCC): **3-05-006-16**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **250**	5. Maximum Annual Rate: **2,190,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Note: maximum rates reflect transfer of clinker. Maximum hourly rate is 24-hour block average.**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Clinker Storage Silos.**		
2. Source Classification Code (SCC):	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **250**	5. Maximum Annual Rate: **2,190,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Rates refer to tons of clinker produced. Maximum hourly rate is 24-hour block average.**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	018	NS
PM_{10}	054	018	NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **5.19** lb/hour **22.74** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.0095 gr/dscf or 0.01 gr/acf** Reference: **Manufacturer Design**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU2-F1.8 for emission calculations.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

<u>Allowable Emissions</u> Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

<u>Allowable Emissions</u> Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

<u>Allowable Emissions</u> Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **5.19** lb/hour **22.74** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **100 percent of PM** Reference:	7. Emissions Method Code: **5**
8. Calculation of Emissions: **Assumed to be the same as PM emissions. See Attachment TM-EU2-F1.8 for emission calculations.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 2

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **10** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Initial VE test using EPA Method 9.**	
5. Visible Emissions Comment: **Rule 40 CFR 63.1348.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 2

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☐ Rule ☒ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Monthly VE test using EPA Method 22. EPA Method 9 if visible emissions are observed during Method 22 test.**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC/PSD-FL-360.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU2-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU2-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID:_____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

EMISSIONS UNIT INFORMATION
Section [2]
Clinker Handling and Storage

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU2-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU2-C15

EMISSION POINT COMMENT

ATTACHMENT TM-EU2-C15
SUMMARY OF STACK PARAMETER DATA FOR THE CLINKER HANDLING AND STORAGE SYSTEM (EU 027)

Emission Unit	Baghouse ID No.	Stack Height (ft)	Vent Size (in)	Exhaust Flow Rate (acfm)	Exhaust Temperature (^{0}F)
Clinker transfer conveyors (cooler to clinker and off-spec silos)	441.BF540	53	12 x 15	4,600	250
Clinker Silos	481.BF140	185	19 x 13	12,000	250
Off-spec clinker silo and conveyors to clinker storage	481.BF330	44	12 x 15	6,100	250
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF540	103	16 x 19	4,700	250
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF640	42	12 x 15	4,700	250
Clinker storage silos 2, 5, 18 and clinker transfer	481.BF730	113	23 x 33	18,700	250
Clinker storage silos 12, 19, 20, 23, 28 and clinker transfer	F633	130	1.0[a]	6,000	77
Clinker storage silos 21, 22, 23, 26, 27, 28	481.BF930	113	20 x 30	15,000	77
Clinker storage silo 17 and clinker transfer	K447	160	1.0[a]	5,000	77

[a]Diameter of round stack.

ATTACHMENT TM-EU2-F1.8

EMISSION CALCULATIONS

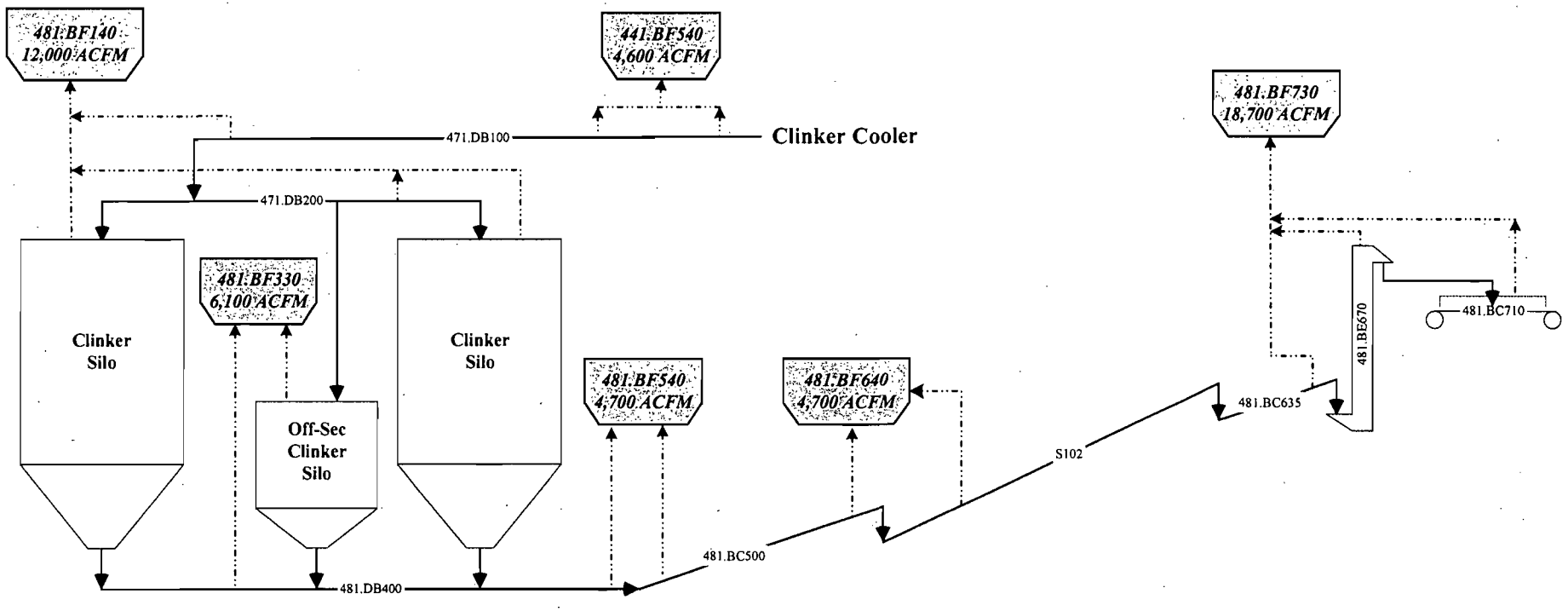
ATTACHMENT TM-EU2-F1.8
CLINKER HANDLING AND STORAGE SYSTEM (EU ID NO. 027) POTENTIAL EMISSION RATES: 2,190,000 TPY CLINKER

Emission Unit	Equip. ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate acfm	Exhaust Flow Rate dscfm	Temperature (°F)	Potential PM/PM10 Emission Rate[a] gr/dscf	gr/acf	lb/hr	TPY
Clinker transfer conveyors (cooler to clinker and off-spec silos)	441.BF540	8,760	4,600	3,421	250	0.0095	--	0.28	1.22
Clinker Silos	481.BF140	8,760	12,000	8,924	250	0.0095	--	0.73	3.18
Off-spec clinker silo and conveyors to clinker storage	481.BF330	8,760	6,100	4,536	250	0.0095	--	0.37	1.62
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF540	8,760	4,700	3,495	250	0.0095	--	0.28	1.25
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF640	8,760	4,700	3,495	250	0.0095	--	0.28	1.25
Clinker storage silos 2, 5, 18 and clinker transfer	481.BF730	8,760	18,700	13,906	250	0.0095	--	1.13	4.96
Clinker storage silos 12, 19, 20, 23, 28 and clinker transfer	F633	8,760	6,000	5,899	77	--	0.01	0.51	2.25
Clinker storage silos 21, 22, 23, 26, 27, 28	481.BF930	8,760	15,000	14,749	77	0.0095	--	1.20	5.26
Clinker storage silo 17 and clinker transfer	K447	8,760	5,000	4,916	77	0.0095	--	0.40	1.75
						Revised Potential Emission Rates =		**5.19**	**22.74**

[a] PM_{10} emission rate calculated as 100 percent of PM emission rate.

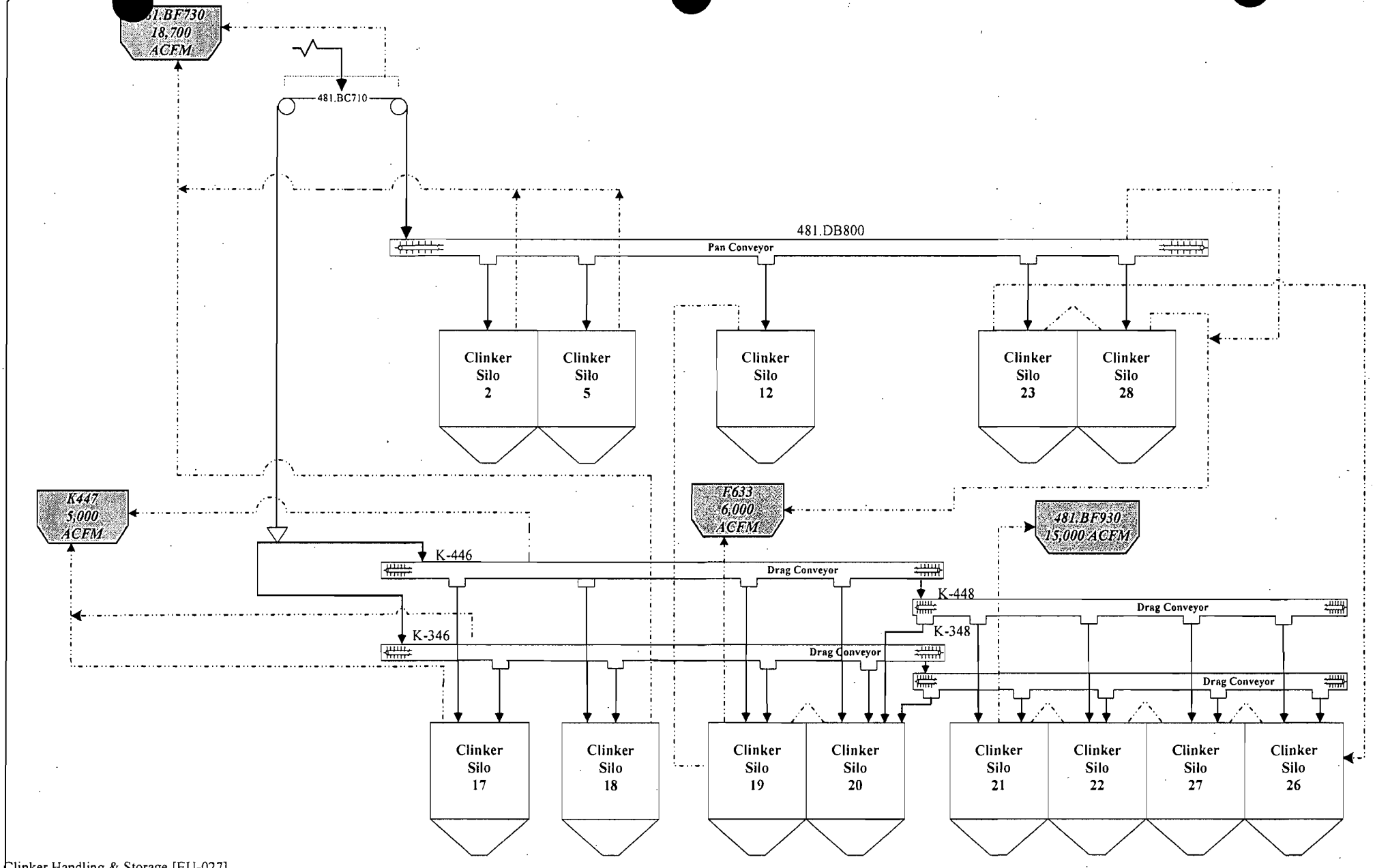
ATTACHMENT TM-EU2-I1

PROCESS FLOW DIAGRAM



Clinker Handling & Storage [EU-027]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND	TITAN AMERICA
Attachment TM-EU2-I1a Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter	



Clinker Handling & Storage [EU-027]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU2-I1b Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/1/2006	Air Flow Solid Matter

TITAN AMERICA

ATTACHMENT TM-EU2-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU2-I3
CONTROL EQUIPMENT INFORMATION FOR CLINKER HANDLING AND STORAGE SYSTEM

Source ID	Baghouse ID No.	Manufacturer	Model No.	Flow Rate (acfm)	Flow Rate (dscfm)	Cloth Area (ft^2)	Air to Cloth Ratio
Clinker transfer conveyors (cooler to clinker and off-spec silos)	441.BF540	FLS Airtech	100C10	4,600	3,421	1,302	3.5
Clinker Silos	481.BF140	FLS Airtech	196C10	12,000	8,924	2,552	4.7
Off-spec clinker silo and conveyors to clinker storage	481.BF330	FLS Airtech	100C10	6,100	4,536	1,302	4.7
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF540	FLS Airtech	100C10	4,700	3,495	1,302	3.6
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF640	FLS Airtech	100C10	4,700	3,495	1,302	3.6
Clinker storage silos 2, 5, 18 and clinker transfer	481.BF730	FLS Airtech	304C10	18,700	13,906	3,958	4.7
Clinker storage silos 12, 19, 20, 23, 28 and clinker transfer	F633	BHA	--	6,000	5,899	1,570	3.8
Clinker storage silos 21, 22, 23, 26, 27, 28	481.BF930	FLS Airtech	304C10	15,000	14,749	3,958	3.8
Clinker storage silo 17 and clinker transfer	K447	Norblo	11-BE-88	5,000	4,916	1,100	4.5

ATTACHMENT TM-EU2-IV1

IDENTIFICATION OF APPLICABLE REQUIREMENTS

ATTACHMENT TM-EU2-IV1

LIST OF APPLICABLE REGULATIONS FOR THE CLINKER HANDLING AND STORAGE

62-296.320(4)(b) – Visible Emissions

40 CFR 63.1342 – NESHAPs Subpart LLL – Standards: General

40 CFR 63.1348 – NESHAPs Subpart LLL – Material Handling Sources Opacity Limit

40 CFR 63.1349 – NESHAPs Subpart LLL – Performance Testing

40 CFR 63.1350 – NESHAPs Subpart LLL – Monitoring

40 CFR 63.1351 – NESHAPs Subpart LLL – Compliance Dates

40 CFR 63.1356 – NESHAPs Subpart LLL – Exemption from NSPS

40 CFR 63 – NESHAPs Subpart A – General Provisions

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
Finish Mill Nos. 1, 2, 3, 4, and 6

3. Emissions Unit Identification Number: **010, 011, 012, 013, and 030**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
Emission unit consists of Finish Mill Nos. 1 (EU 010), 2 (EU 011), 3 (EU 012), 4 (EU 013), and 6 (EU 030).

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (13)

   Process Enclosure

2. Control Device or Method Code(s): **018, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	**359 TPH (24-hour block average)**
2. Maximum Production Rate:	**3,144,840 TPY**
3. Maximum Heat Input Rate:	million Btu/hr
4. Maximum Incineration Rate:	pounds/hr tons/day
5. Requested Maximum Operating Schedule:	**24** hours/day **7** days/week **52** weeks/year **8,760** hours/year

6. Operating Capacity/Schedule Comment:

Finish Mill No. 2 is used as a back-up and operates only when another mill is shut down.

Individual capacities:

- **Finish Mill No. 1 - 25 TPH**
- **Finish Mill No. 2 - 25 TPH**
- **Finish Mill No. 3 - 84 TPH**
- **Finish Mill No. 4 - 140 TPH**
- **Finish Mill No. 6 - 110 TPH**

Worst Case Total (1+3+4+6) = 359 TPH

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 010, 011, 012, 013, 030**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **13 baghouse stacks. See Attachment TM-EU3-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **V**	6. Stack Height: **85** feet	7. Exit Diameter: **4.50** feet
8. Exit Temperature: **169** °F	9. Actual Volumetric Flow Rate: **77,800** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: **65,307** dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Stack data representative of O-Sepa Separator baghouse stack on Finish Mill No. 3 (Equipment ID No. 533.BF340). Refer to Attachment TM-EU3-C15 for stack parameters for other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 1

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Clinker Grinding.**		
2. Source Classification Code (SCC): **3-05-006-17**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **359**	5. Maximum Annual Rate: **3,144,840**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Maximum annual rate based on 8,760 hours per year of operation. Maximum hourly rate is 24-hour block average.**		

Segment Description and Rate: Segment _____ of _____

1. Segment Description (Process/Fuel Type):		
2. Source Classification Code (SCC):	3. SCC Units:	
4. Maximum Hourly Rate:	5. Maximum Annual Rate:	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment:		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	018	NS
PM_{10}	054	018	NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **31.1** lb/hour **136.2** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.0095 gr/dscf or 0.01 gr/acf** Reference: **Manufacturer Design**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU3-F1.8 for calculation of emissions.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **31.1** lb/hour **136.2** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **100 percent of PM** Reference:	7. Emissions Method Code: **5**
8. Calculation of Emissions: **Assumed to be the same as PM emissions; see Attachment TM-EU3-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 2

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☐ Rule ☒ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Daily visible emissions test using EPA Method 22. Follow-up Method 22 within 24 hours, if VE observed. EPA Method 9 test if visible emissions are observed during follow-up Method 22 test.**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC / PSD-FL-360.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 2

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **10** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Initial test using EPA Method 9**	
5. Visible Emissions Comment: **40 CFR 63.1347. MACT, applicable to all Finish Mills.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU3-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU3-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU3-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU3-C15

EMISSION POINT COMMENT

ATTACHMENT TM-EU3-C15
SUMMARY OF STACK PARAMETER DATA FOR THE FINISH MILLS (EU 010, 011, 012, 013, 030)

Emission Unit	Baghouse ID No.	Stack Height (ft)	Stack Diameter (ft)	Exhaust Flow Rate (acfm)	Exhaust Temperature (^{o}F)
Finish Mill No. 1 Baghouse	F113	106	1.0	11,800	110
Finish Mill No. 1 Baghouse	F130	106	1.0	16,480	110
Finish Mill No. 2 Baghouse	F213	106	1.0	11,800	110
Finish Mill No. 2 Baghouse	F230	106	1.0	16,480	110
Finish Mill No. 3 Baghouse	F313	106	1.5	8,000	110
Finish Mill No. 3 Baghouse	F332	106	1.5	25,000	110
Finish Mill No. 3 O'Sepa Baghouse	533.BF340	85	4.5	77,800	169
Finish Mill No. 4 Baghouse	F432	106	2.0	15,000	110
Finish Mill No. 4 Baghouse	F430	106	1.0	32,000	110
Finish Mill No. 4 O'Sepa Baghouse	F730	--	--	117,000	169
Finish Mill No. 6 Baghouse	516.BF510	35	--	1,950	110
Finish Mill No. 6 Baghouse	536.BF500	110	2.0	25,900	175
Finish Mill No. 6 O'Sepa Baghouse	536.BF340	110	2.0	97,300	175

ATTACHMENT TM-EU3-F1.8

EMISSION CALCULATIONS

ATTACHMENT TM-EU3-F1.8
FINISH MILLS (EU ID NOS. 010, 011, 012, 013, AND 030) POTENTIAL EMISSION RATES

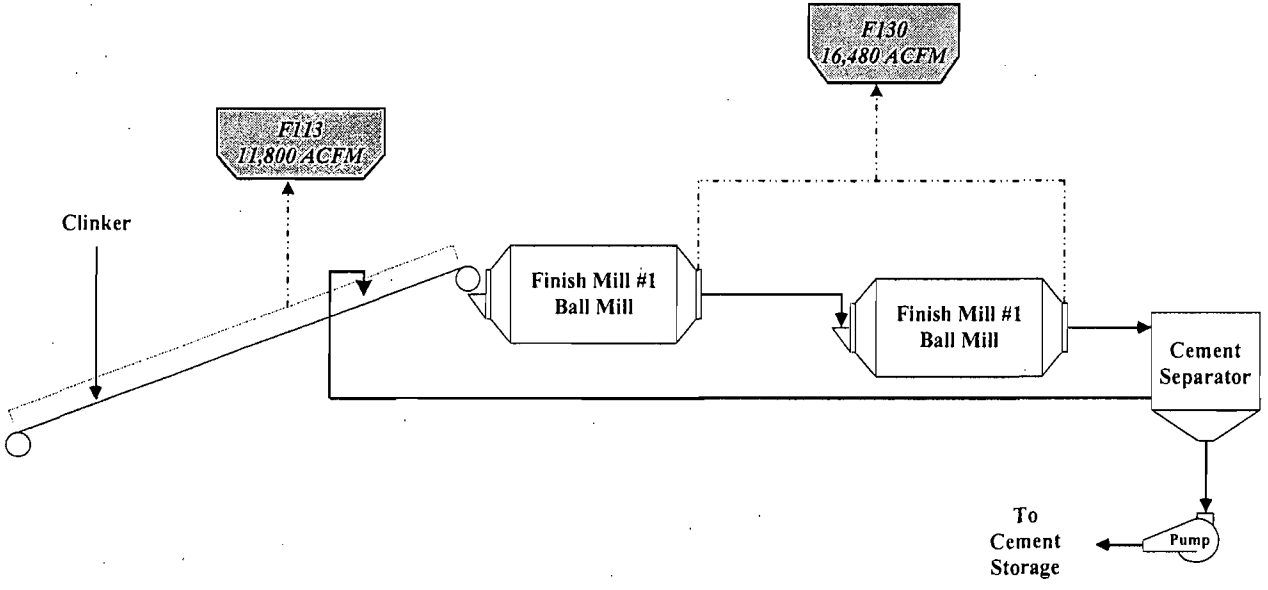
Emission Unit	Equipment ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate acfm	Exhaust Flow Rate dscfm	Temperature (°F)	Potential PM/PM_{10} Emission Rate[a] gr/dscf	gr/acf	lb/hr	TPY
Finish Mill No. 1 Baghouse	F113	8,760	11,800	--	110	--	0.01	1.01	4.43
Finish Mill No. 1 Baghouse	F130	8,760	16,480	--	110	--	0.01	1.41	6.19
Finish Mill No. 2 Baghouse	F213	8,760	11,800	--	110	--	0.01	1.01	4.43
Finish Mill No. 2 Baghouse	F230	8,760	16,480	--	110	--	0.01	1.41	6.19
Finish Mill No. 3 Baghouse	F313	8,760	8,000	--	110	--	0.01	0.69	3.00
Finish Mill No. 3 Baghouse	F332	8,760	25,000	--	110	--	0.01	2.14	9.39
Finish Mill No. 3 O'Sepa Baghouse	533.BF340	8,760	77,800	65,307	169	0.0095	--	5.32	23.29
Finish Mill No. 4 Baghouse	F432	8,760	15,000	--	110	--	0.01	1.29	5.63
Finish Mill No. 4 Baghouse	F430	8,760	32,000	--	110	--	0.01	2.74	12.01
Finish Mill No. 4 O'Sepa Baghouse	F730	8,760	117,000	98,213	169	0.0095	--	8.00	35.03
Finish Mill No. 6 Baghouse	516.BF510	8,760	1,950	1,806	110	0.0095	--	0.15	0.64
Finish Mill No. 6 Baghouse	536.BF500	8,760	25,900	21,536	175	0.0095	--	1.75	7.68
Finish Mill No. 6 O'Sepa Baghouse	536.BF340	8,760	97,300	80,905	175	0.0095	--	6.59	28.86
						Potential Emission Rates[b] =		**31.09**	**136.15**

[a] PM_{10} emission rate calculated as 100 percent of PM emission rate.

[b] Total includes the worst-case combination of Finish Mill Nos. 1, 3, 4, and 6 as Finish Mill No. 2 is used as a back-up.

ATTACHMENT TM-EU3-I1

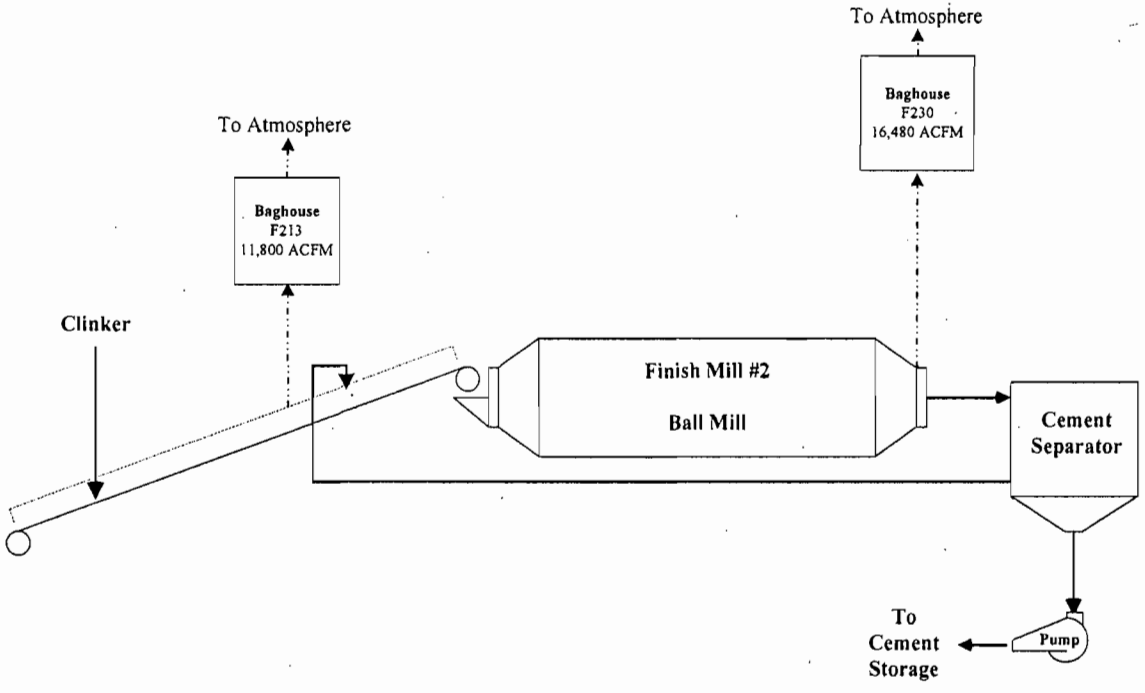
PROCESS FLOW DIAGRAM



Finish Mill #1 [EU-010]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU3-I1a Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 1/30/2006	Air Flow Solid Matter

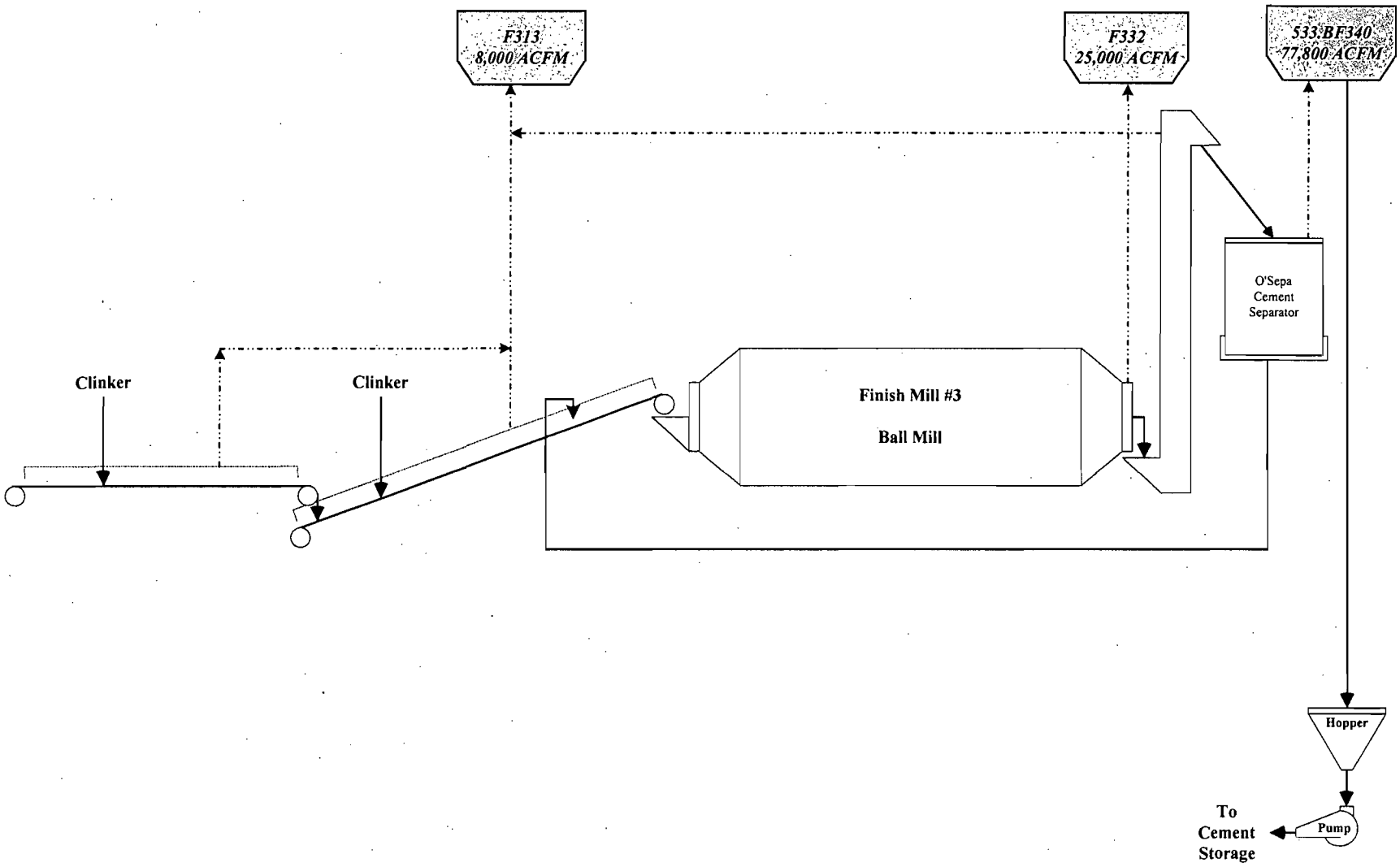
TITAN AMERICA



Finish Mill #1 [EU-011]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU3-I1b Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 1/30/2006	Air Flow Solid Matter

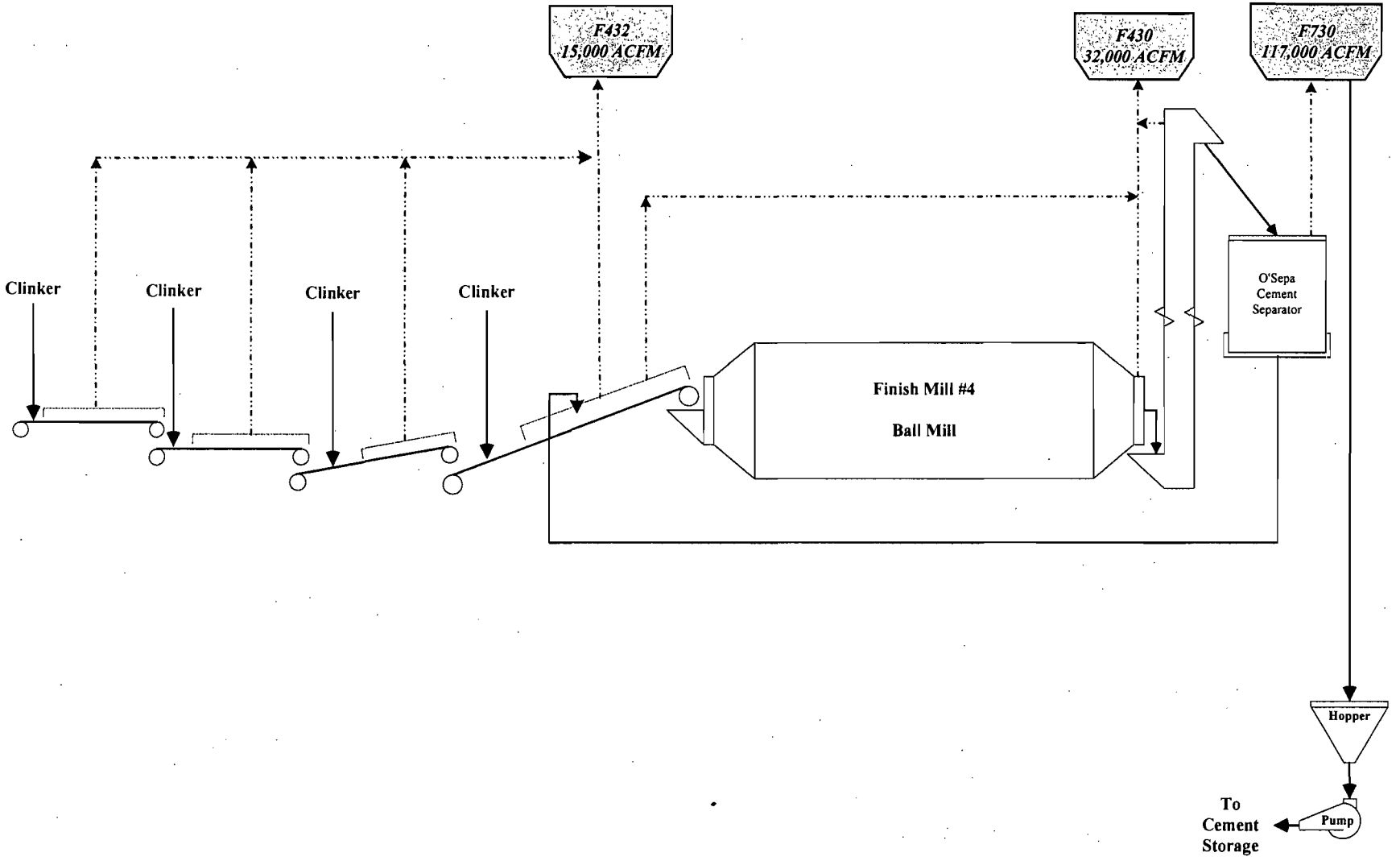
TITAN AMERICA



Finish Mill #3 [EU-012]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU3-I1c Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter

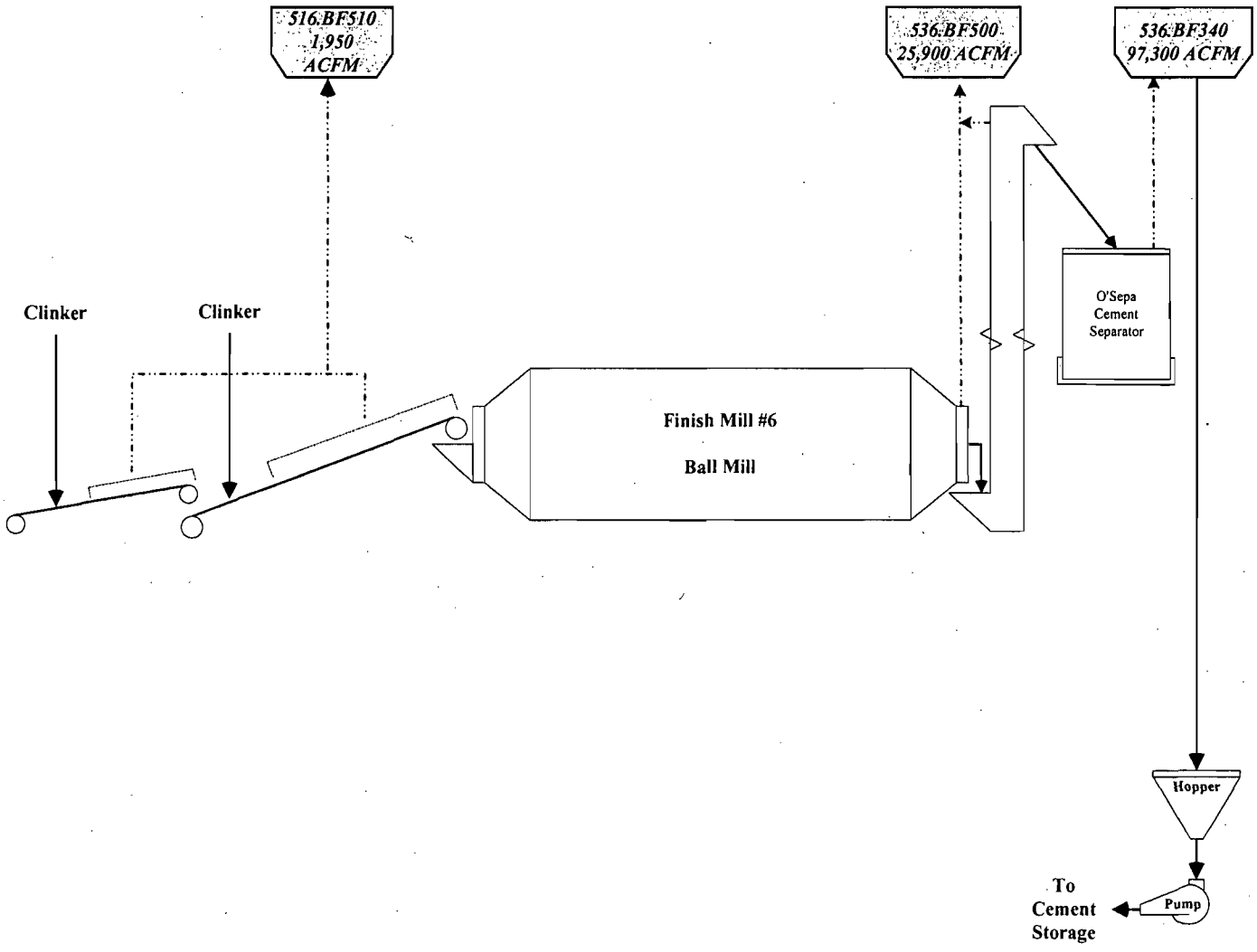
TITAN AMERICA



Finish Mill #4 [EU-013]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU3-I1d Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter

TITAN AMERICA



Finish Mill #6 [EU-030]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND	TITAN AMERICA
Attachment TM-EU3-I1e Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter	

ATTACHMENT TM-EU3-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU3-I3
CONTROL EQUIPMENT INFORMATION FOR FINISH MILL NOS. 1, 2, 3, 4, AND 6

Source ID	Baghouse ID No.	Manufacturer	Model No.	Flow Rate (acfm)	Flow Rate (dscfm)	Cloth Area (ft^2)	Air to Cloth Ratio
Finish Mill No. 1 Feeder	F113	Mikropul	168S-10-20	11,800	--	2,100	5.6
Finish Mill No. 1 Mill Sweep	F130	BHA	--	16,480	--	3,927	4.2
Finish Mill No. 2 Feeder	F213	Mikropul	168S-10-20	11,800	--	2,100	5.6
Finish Mill No. 2 Mill Sweep	F230	BHA	--	16,480	--	3,927	4.2
Finish Mill No. 3 Feeder	F313	Micropul	196S-10-20	8,000	--	2,300	3.5
Finish Mill No. 3 Mill Sweep	F332	BHA	390 AMT	25,000	--	5,497	4.5
Finish Mill No. 3 O'Sepa Cement Separator	533.BF340	Fuller	1110S12(6)	77,800	65,307	20,923	3.7
Finish Mill No. 4 Feeder	F432	Fuller	5 Zone #48	17,000	--	2,510	6.8
Finish Mill No. 4 Mill Sweep	F430	Fuller	6 Zone #96	30,000	--	6,028	5.0
Finish Mill No. 4 O'Sepa Cement Separator	F730	Fuller	2M840S12(6)	117,000	98,213	31,688	3.7
Finish Mill No. 6 Feeder	516.BF510	FLS Airtech	36DS8	1,950	1,806	377	5.2
Finish Mill No. 6 Mill Sweep	536.BF500	Fuller	360S12(6)	25,900	21,536	6,786	3.8
Finish Mill No. 6 O'Sepa Cement Separator	536.BF340	Fuller	2M690S12(6)	97,300	80,905	34,683	2.8

ATTACHMENT TM-EU3-IV1

IDENTIFICATION OF APPLICABLE REQUIREMENTS

ATTACHMENT TM-EU3-IV1

LIST OF APPLICABLE REGULATIONS
FOR THE FINISH MILLS (EU ID NOS. 010, 012, 013, 030)

62-296.320(4)(a) – Visible Emissions

40 CFR 63.1342 – NESHAPs Subpart LLL – Standards: General

40 CFR 63.1347 – NESHAPs Subpart LLL – Standards for Raw and Finish Mills

40 CFR 63.1348 – NESHAPs Subpart LLL – Material Handling Sources Opacity Limit

40 CFR 63.1349 – NESHAPs Subpart LLL – Performance Testing

40 CFR 63.1350 – NESHAPs Subpart LLL – Monitoring

40 CFR 63.1351 – NESHAPs Subpart LLL – Compliance Dates

40 CFR 63.1356 – NESHAPs Subpart LLL – Exemption from NSPS

40 CFR 63 – NESHAPs Subpart A – General Provisions

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Raw Mill and Pyroprocessing Unit

3. Emissions Unit Identification Number: **028**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Pyroprocessing consists of the preheater/calciner, kiln, and cooler.

EMISSIONS UNIT INFORMATION
Section [4]
Raw Mill and Pyroprocessing Unit

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (7)

   Process Enclosure

2. Control Device or Method Code(s): **016, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **250 TPH (24-hour block average) clinker**	
2. Maximum Production Rate: **2,190,000 TPY clinker**	
3. Maximum Heat Input Rate: **675** million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year

6. Operating Capacity/Schedule Comment:

Production rates relate to clinker production.

Source Description	Heat Input Rate (MMBtu/hr)
Calciner	385
Kiln	290
Total	675

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **028**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **7 baghouse stacks. See Attachment TM-EU4-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common: **EU 026 - Coal Handling System (Coal Mill baghouse exhausts to main stack).**		
5. Discharge Type Code: **V**	6. Stack Height: **410** feet	7. Exit Diameter: **14** feet
8. Exit Temperature: **200** °F	9. Actual Volumetric Flow Rate: **515,000** acfm	10. Water Vapor: **14%**
11. Maximum Dry Standard Flow Rate: **228,000** dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Data for main stack. Representative of clinker production with raw mill operating. With raw mill down, parameters are 605,000 acfm @ 500°F. See Attachment TM-EU4-C15 for stack parameters for other sources. Dry standard flow rate is at 7 percent oxygen.** **515,000 acfm x [528/(460 + 200)] x (1-0.14) = 354,320 dscfm @ 12 percent O_2.** **354,320 dscfm x (21-12)/(21-7) = 228,000 dscfm @ 7 percent O_2.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 8

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Raw Material Grinding and Drying.**		
2. Source Classification Code (SCC): **3-05-006-13**	3. SCC Units: **Raw Feed Produced**	
4. Maximum Hourly Rate: **425 (dry)**	5. Maximum Annual Rate: **3,723,000 (dry)**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Segment refers to raw dry feed produced from raw mill, based on 250 TPH clinker production.**		

Segment Description and Rate: Segment 2 of 8

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Kilns.**		
2. Source Classification Code (SCC): **3-05-006-06**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **250**	5. Maximum Annual Rate: **2,190,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Segment refers to clinker production. Maximum hourly rate is 24-hour block average.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 3 of 8

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing; Dry Process; Clinker Cooler.**		
2. Source Classification Code (SCC): **3-05-006-14**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **250**	5. Maximum Annual Rate: **2,190,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Segment refers to clinker through clinker cooler.**		

Segment Description and Rate: Segment 4 of 8

1. Segment Description (Process/Fuel Type): **In-process Fuel Use; Industrial Processes; Cement Kiln/Dryer (Bituminous Coal).**		
2. Source Classification Code (SCC): **3-90-002-01**	3. SCC Units: **Tons Burned**	
4. Maximum Hourly Rate: **30**	5. Maximum Annual Rate: **263,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur: **3.5**	8. Maximum % Ash:	9. Million Btu per SCC Unit: **25**
10. Segment Comment: **Maximum annual rate based on 2,190,000 TPY clinker. Maximum hourly rate is 24-hour block average. Includes coal and petroleum coke.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 5 of 8

1. Segment Description (Process/Fuel Type): **In-process Fuel Use; Industrial Processes; General-Coke.**		
2. Source Classification Code (SCC): **3-90-008-99**	3. SCC Units: **Tons Burned**	
4. Maximum Hourly Rate: **20**	5. Maximum Annual Rate: **175,200**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur: **5.5**	8. Maximum % Ash:	9. Million Btu per SCC Unit: **28.4**
10. Segment Comment: **Refers to petroleum coke.**		

Segment Description and Rate: Segment 6 of 8

1. Segment Description (Process/Fuel Type): **In-process Fuel Use; Industrial Processes; Cement Kiln/Dryer No. 2 Fuel Oil with Used Oil Blend.**		
2. Source Classification Code (SCC): **3-90-005-02**	3. SCC Units: **1,000 Gallons Burned**	
4. Maximum Hourly Rate: **4.86**	5. Maximum Annual Rate: **31,914**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur: **0.5**	8. Maximum % Ash:	9. Million Btu per SCC Unit: **138.8**
10. Segment Comment:		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 7 of 8

1. Segment Description (Process/Fuel Type): **In-process Fuel Use; Industrial Processes; Cement Kiln/Dryer No. 6 Fuel Oil with Used Oil Blend.**		
2. Source Classification Code (SCC): **3-90-004-02**	3. SCC Units: **1,000 Gallons Burned**	
4. Maximum Hourly Rate: **4.44**	5. Maximum Annual Rate: **29,185**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur: **2.0**	8. Maximum % Ash:	9. Million Btu per SCC Unit: **152**
10. Segment Comment:		

Segment Description and Rate: Segment 8 of 8

1. Segment Description (Process/Fuel Type): **In-process Fuel Use; Industrial Processes; Cement Kiln/Dryer; Natural Gas.**		
2. Source Classification Code (SCC): **3-90-006-02**	3. SCC Units: **Million Cubic Feet Burned**	
4. Maximum Hourly Rate: **0.68**	5. Maximum Annual Rate: **4,436**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit: **1,000**
10. Segment Comment:		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
SO_2			EL
PM	054	016	EL
PM_{10}	054	016	EL
DIOX			EL
NO_x			EL
CO			EL
VOC			EL
SAM			NS
Hydrochloric Acid - H106			NS
Mercury			EL

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **SO_2**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **320** lb/hour **548** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Permit Limit** Reference: **Permit No. 0250020-017-AC/PSD-FL-360**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

24 Hour:
320 lb/hr; equivalent to 1.28 lb/ton clinker @ 250 TPH clinker.

Annual:
0.50 lb/ton clinker produced x 2,190,000 TPY clinker produced x 1 ton/2,000 lb = 548 TPY SO_2

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
Annual emissions based on 30-operating day block average limit.
See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 4

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **320 lb/hr**	4. Equivalent Allowable Emissions: **320** lb/hour tons/year
5. Method of Compliance: **SO_2 CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Allowable emissions on a 24-hour average basis.** **Based on Limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions 2 of 4

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.50 lb/ton clinker**	4. Equivalent Allowable Emissions: lb/hour **548** tons/year
5. Method of Compliance: **SO_2 CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Annual limit based on 30-operating day block average.** **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions 3 of 4

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **1.2 lb/MMBtu**	4. Equivalent Allowable Emissions: **810** lb/hour tons/year
5. Method of Compliance: **EPA Method 6**	
6. Allowable Emissions Comment (Description of Operating Method): **Additional SO_2 limit when solid fuel is fired (24-hour average). Miami-Dade Co. Code, Section 24-17(2)(a).**	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 4 of 4

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.8 lb/MMBtu**	4. Equivalent Allowable Emissions: **540** lb/hour tons/year
5. Method of Compliance: **EPA Method 6**	
6. Allowable Emissions Comment (Description of Operating Method): **Additional SO_2 limit when liquid fuel is fired (24-hour average). Miami-Dade Co. Code, Section 24-17(2)(a).**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **28.4** lb/hour **124.3** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.063 lb/ton dry kiln feed (DKF)** Reference: **Proposed Limit**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

Main Stack - Hourly:
425 TPH DKF x 0.063 lb/ton clinker = 26.8 lb/hr

Main Stack - Annual:
3,723,000 TPY x DKF x 0.063 lb/ton/2,000 lb = 117.3 TPY

Other Baghouses:
1.64 lb/hr; 7.0 TPY.

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 3

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.063 lb/ton DKF**	4. Equivalent Allowable Emissions: **26.8** lb/hour **117.3** tons/year
5. Method of Compliance: **Annual EPA Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Applies to emissions from main stack only.**	

Allowable Emissions Allowable Emissions 2 of 3

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.3 lb/ton DKF**	4. Equivalent Allowable Emissions: **127.5** lb/hour **558.5** tons/year
5. Method of Compliance: **Annual EPA Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **40 CFR 63.1344. For kiln only, based on feed to kiln.**	

Allowable Emissions Allowable Emissions 3 of 3

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.1 lb/ton DKF**	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance: **Annual EPA Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **40 CFR 63.1345. For cooler only, based on feed to kiln.**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **24.1** lb/hour **105.7** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **84 percent of PM** Reference:	7. Emissions Method Code: **0**

8. Calculation of Emissions:

Hourly:

84 percent of PM for Main Stack = 0.84 x 26.8 lb/hr = 22.5 lb/hr
100 percent of PM for other baghouses = 1.64 lb/hr

Annual

84 percent of PM for Main Stack = 0.84 x 117.3 TPY = 98.7 TPY
100 percent of PM for other baghouses = 7.0 TPY

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions **1** of **1**

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.053 lb/ton dry Kiln feed**	4. Equivalent Allowable Emissions: **22.5** lb/hour **98.7** tons/year
5. Method of Compliance: **Annual Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Applies to emissions from main stack only. See Attachment TM-EU4-F1.8.**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **DIOX**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **3.4×10^{-7}** lb/hour **1.5×10^{-6}** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.4 ng/dscm @ 7% O_2** Reference: **40 CFR 63.1343(b)(3)**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

0.4 ng TEQ/dscm x (1 lb/454g) x (1 g/10^9 ng) x 228,000 dscf/min x (m^3/35.3 ft^3) x 60 min/hr = 3.4×10^{-7} lb/hr

3.4×10^{-7} lb/hr x 8,760 hr/yr x 1 ton/2,000 lb = 1.5×10^{-6} TPY

See Attachment TM-EU4-F1.8.

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
Emissions are from main stack. Flow rate based on 515,000 acfm @ 12 percent O_2 = 228,000 dscfm @ 7 percent O_2.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 2

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.4 ng/dscm @ 7% O_2**	4. Equivalent Allowable Emissions: **3.4×10^{-7}** lb/hour **1.5×10^{-6}** tons/year
5. Method of Compliance: **EPA Method 23**	
6. Allowable Emissions Comment (Description of Operating Method): **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360 and 40 CFR 63.1343(b)(3) for control device temperature < 204°C.**	

Allowable Emissions Allowable Emissions 2 of 2

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.2 ng/dscm @ 7% O_2.**	4. Equivalent Allowable Emissions: **1.7×10^{-7}** lb/hour **0.75×10^{-6}** tons/year
5. Method of Compliance: **EPA Method 23**	
6. Allowable Emissions Comment (Description of Operating Method): **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360 and 40 CFR 63.1343(b)(3) for control device temperature > 204°C.**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **NO_x**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **720** lb/hour **2,376** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Permit Limit** Reference: **Permit No. 0250020-017-AC**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

24-Hour:

720 lb/hr, based on the following:
2.88 lb NO_x/ton clinker produced (24-hour average) x 250 TPH clinker produced (24-hour average) = 720 lb NO_x/hr

Annual:
2.17 lb NO_x/ton clinker produced (annual average) x 2,190,000 TPY clinker x 1 ton/2,000 lb = 2,376 TPY NO_x

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
Annual emissions based on a 12-month rolling average limit. See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 3

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **720 lb/hr, 24-hr average**	4. Equivalent Allowable Emissions: **720** lb/hour tons/year
5. Method of Compliance: **NO_x CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Based on Limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions 2 of 3

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **2.17 lb/ton clinker**	4. Equivalent Allowable Emissions: lb/hour **2,376** tons/year
5. Method of Compliance: **NO_x CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Annual limit in lb/ton based on 12-month rolling average. Based on limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions 3 of 3

1. Basis for Allowable Emissions Code: **RULE**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **2.0 lb/MMBtu**	4. Equivalent Allowable Emissions: **1,350** lb/hour **5,913** tons/year
5. Method of Compliance: **NO_x CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Emission limit based on Rule 62-296.570(4)(b)8. Maximum heat input is 675 MMBtu/hr.**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **CO**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **576** lb/hour **2,190** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Permit Limit** Reference: **Permit No. 0250020-017-AC/PSD-FL-360**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

24-Hour:
576 lb/hr, based on the following:

2.3 lb CO/ton clinker produced (24-hour average) x 250 TPH clinker produced (24-hour average) = 576 lb CO/hr

Annual:
2.0 lb CO/ton clinker produced (annual average) x 2,190,000 TPY clinker x 1 ton/2,000 lb = 2,190 TPY CO

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
Annual emissions based on 30 operating-day block average limit.
See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 2

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **576 lb/hr, 24-hr average**	4. Equivalent Allowable Emissions: **576** lb/hour tons/year
5. Method of Compliance: **EPA Method 10**	
6. Allowable Emissions Comment (Description of Operating Method): **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360**	

Allowable Emissions Allowable Emissions 2 of 2

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **2.0 lb/ton clinker**	4. Equivalent Allowable Emissions: lb/hour **2,190** tons/year
5. Method of Compliance: **EPA Method 10**	
6. Allowable Emissions Comment (Description of Operating Method): **Annual limit in lb/ton clinker based on a 30 operating-day block average. Based on limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **VOC**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **40** lb/hour **175** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Permit Limit** Reference: **Permit No. 0250020-017-AC/PSD-FL-360**	7. Emissions Method Code: **0**

8. Calculation of Emissions:

24-Hour:
40 lb/hr, based on the following:

0.16 lb VOC/ton clinker produced (24-hour average) x 250 TPH clinker produced (24-hour average)

Annual:
0.16 lb VOC/ton clinker produced x 2,190,000 TPY clinker produced x 1 ton/2,000 lb = 175 TPY VOC

9. Pollutant Potential/Estimated Fugitive Emissions Comment:
Annual emissions based on 30 operating-day block average limit.
See Attachment TM-EU4-F1.8.

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 2

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **40 lb/hr**	4. Equivalent Allowable Emissions: **40** lb/hour tons/year
5. Method of Compliance: **VOC CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Allowable based on 24-hour block average. Based on Permit No. 0250020-017-AC/PSD-FL-360**	

Allowable Emissions Allowable Emissions 2 of 2

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **0.16 lb/ton clinker**	4. Equivalent Allowable Emissions: lb/hour **175** tons/year
5. Method of Compliance: **VOC CEMS**	
6. Allowable Emissions Comment (Description of Operating Method): **Emission limit in lb/ton clinker based on a 30-operating day block average. Based on limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **Mercury**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.026** lb/hour **0.115** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Permit Limit** Reference: **Permit No. 0250020-017-AC/PSD-FL-360**	7. Emissions Method Code: **0**
8. Calculation of Emissions: **Annual: 229 lb/yr** **24-Hour:** **Based on annual limit and annual production cap of 2,190,000 TPY clinker:** **1.05 x 10^{-4} lb Mercury/ton clinker produced x 250 TPH clinker produced = 0.026 lb/hr**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 1

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **229 lb/yr**	4. Equivalent Allowable Emissions: lb/hour **0.115** tons/year
5. Method of Compliance: **Material balance and maintaining records of monthly and rolling 12-month Mercury throughput.**	
6. Allowable Emissions Comment (Description of Operating Method): **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360.**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 2

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **10** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **COMS or EPA Method 9 initially and every 5 years thereafter.**	
5. Visible Emissions Comment: **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360. Applies only to the main stack baghouse (ID No. 331-BF200).**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 2

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 22 (EPA Method 9 in case of visible emissions observed during Method 22 testing).**	
5. Visible Emissions Comment: **Based on limit in Permit No. 0250020-017-AC/PSD-FL-360. Applies to all baghouses except the main stack baghouse (ID No. 331-BF200).**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor **1** of **5**

1. Parameter Code: **VE**	2. Pollutant(s):
3. CMS Requirement: ☒ Rule ☐ Other	
4. Monitor Information... Manufacturer: **Durag** Model Number: **D-R 290** Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment: **40 CFR 63, Subpart LLL and Permit No. 0250020-017-AC/PSD-FL-360.**	

Continuous Monitoring System: Continuous Monitor **2** of **5**

1. Parameter Code: **NO_x**	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☒ Other	
4. Monitor Information... Manufacturer: **Siemens** Model Number: **Ultramat/Oxymat 6** Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment: **Required by permit condition in Permit No. 0250020-017-AC/PSD-FL-360.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor **3** of **5**

1. Parameter Code: **SO_2**	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☒ Other	
4. Monitor Information... Manufacturer: **Siemens** Model Number: **Ultramat/Oxymat 6** Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment: **Required by permit condition in Permit No. 0250020-017-AC/PSD-FL-360.**	

Continuous Monitoring System: Continuous Monitor **4** of **5**

1. Parameter Code: **VOC**	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☒ Other	
4. Monitor Information... Manufacturer: **MeB - Analysentechnik GmbH** Model Number: **Thermo-FID Model MK** Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment: **Required by permit condition in Permit No. 0250020-017-AC/PSD-FL-360.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor **5** of **5**

1. Parameter Code: **CO**	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☒ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment: **Required by permit condition in Permit No. 0250020-017-AC/PSD-FL-360.**	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☐ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU4-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU4-I2** ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU4-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU4-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☒ Attached, Document ID: **TM-EU4-IV3** ☐ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU4-C15

SUMMARY OF STACK PARAMETER DATA

ATTACHMENT TM-EU4-C15
SUMMARY OF STACK PARAMETER DATA FOR THE RAW MILL AND PYROPROCESSING SYSTEM (EU 028)

Emission Unit	Baghouse ID No.	Stack Height (ft)	Stack Diameter (ft)	Exhaust Flow Rate (acfm)	Exhaust Temperature (°F)
Kiln/Cooler/Raw Mill[d]	331.BF200	410	14	515,000[a]	200[a]
Kiln Dust Conveyance and Storage Bin	331.BF740	125	1.00 x 1.25	4,250	300
Clinker Feed (CF) Silo	341.BF350	241	0.92 x 1.08	3,760	178
Raw Meal Conveyance (CF Silo)	351.BF410	84	0.92 x 1.08	4,000	178
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF440	45	1.00 x 1.25	4,760	178
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF470	353	1.00 x 1.25	4,100	175
Kiln Dust Truck Loadout	331.BF645	46	0.83	3,500	175

[a]When raw mill is operating; parameters are 605,000 acfm and 400°F when raw mill is down.

ATTACHMENT TM-EU4-F1.8

EMISSION CALCULATIONS

ATTACHMENT TM-EU4-F1.8a
RAW MILL AND PYROPROCESSING UNIT SYSTEM (EU ID NO. 028) POTENTIAL PM/PM10 EMISSION RATES

Emission Unit	Equip. ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate acfm	Exhaust Flow Rate dscfm	Temperature (°F)	Potential PM Emission Rate gr/dscf	Potential PM Emission Rate lb/hr	Potential PM Emission Rate TPY	Potential PM_{10} Emission Rate lb/hr	Potential PM_{10} Emission Rate TPY
Kiln/Cooler/Raw Mill[d]	331.BF200	8,760	515,000	354,320	200	[a]	26.8 [d]	117.3 [d]	22.5 [b,d]	98.7 [b,d]
Kiln Dust Conveyance and Storage Bin	331.BF740	8,760	4,250	2,953	300	0.0095	0.24	1.05	0.24 [c]	1.05 [c]
Clinker Feed (CF) Silo	341.BF350	8,760	3,760	3,112	178	0.0095	0.25	1.11	0.25 [c]	1.11 [c]
Raw Meal Conveyance (CF Silo)	351.BF410	8,760	4,000	3,310	178	0.0095	0.27	1.18	0.27 [c]	1.18 [c]
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF440	8,760	4,760	3,939	178	0.0095	0.32	1.40	0.32 [c]	1.40 [c]
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF470	8,760	4,100	3,409	175	0.0095	0.28	1.22	0.28 [c]	1.22 [c]
Kiln Dust Truck Loadout	331.BF645	8,760	3,500	2,910	175	0.0095	0.24	1.04	0.24 [c]	1.04 [c]
					Revised Potential Emission Rates =		**28.40**	**124.30**	**24.11**	**105.70**
					Revised Potential Emission Rates without Kiln/Cooler/Raw Mill =		**1.6**	**7.0**	**1.60**	**7.0**

[a] Emission rate based on an emission factor of 0.063 lb/ton of dry kiln feed.

[b] PM_{10} emission rate calculated as 84 percent of PM emission rate.

[c] PM_{10} emission rate calculated as 100 percent of PM emission rate.

[d] Includes emissions from the Coal Mill (EU ID No. 001) when the Kiln/Cooler/Raw Mill and Coal Mill are operating simultaneously.

ATTACHMENT TM-EU4-F1.8b
DRY KILN, COOLER, AND RAW MILL (EU ID NO. 028)
POTENTIAL EMISSIONS VENTED FROM THE MAIN STACK

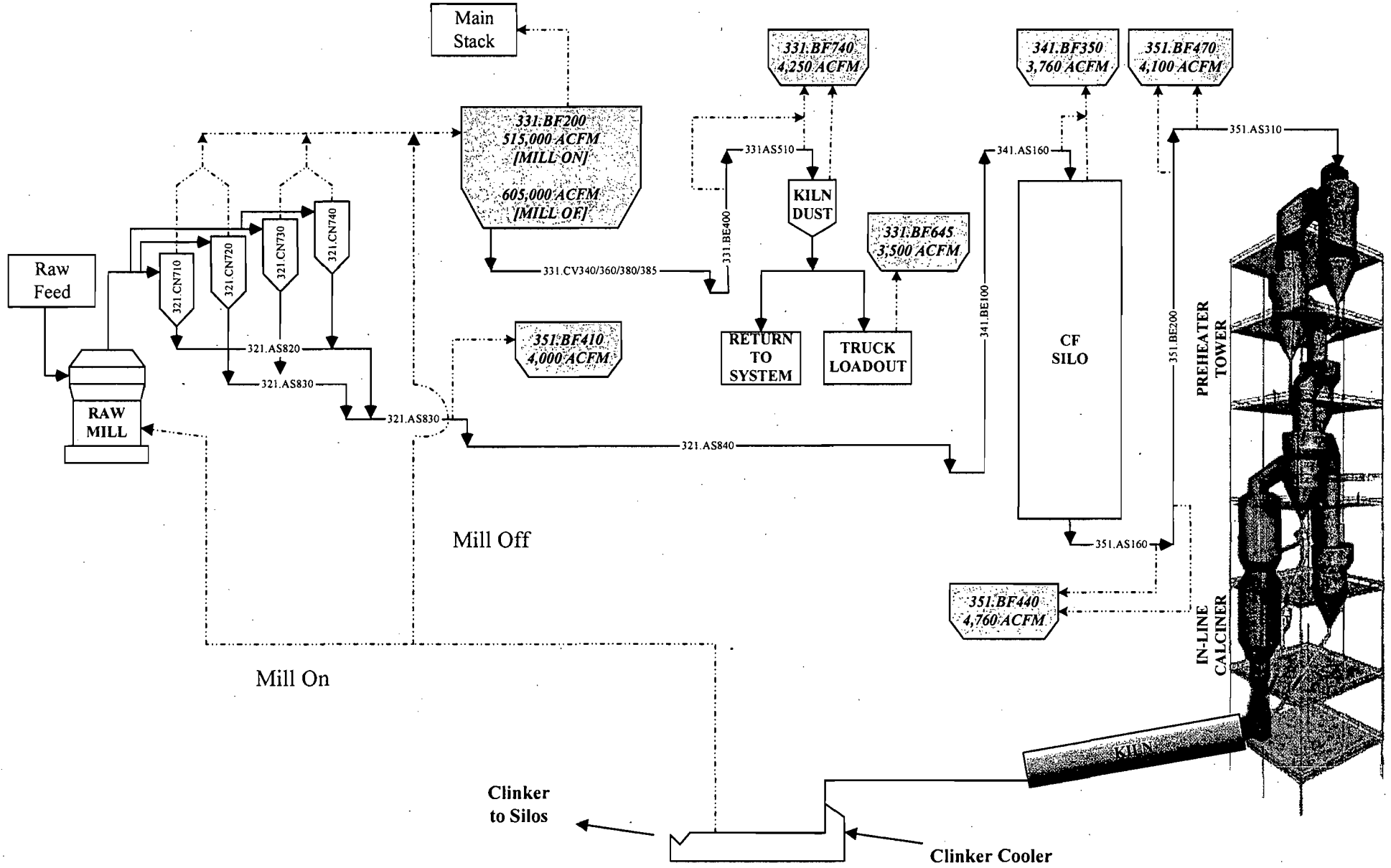
Pollutant	Emission Factor	Activity Factor	Emission Rate [b] lb/hr	Emission Rate [b] TPY
		24-Hour		
Particulate Matter (PM)a	0.063 lb/ton DKF	425 TPH DKF	26.8	--
Particulate Matter (PM_{10})a	0.053 lb/ton DKF	425 TPH DKF	22.5	--
Sulfur Dioxide	1.28 lb/ton CP	250 TPH CP	320	--
Nitrogen Oxides	2.88 lb/ton CP	250 TPH CP	720	--
Carbon Monoxide	2.30 lb/ton CP	250 TPH CP	576	--
Volatile Organic Compounds	0.16 lb/ton CP	250 TPH CP	40	--
Mercury	1.05E-04 lb/ton CP	250 TPH CP	2.61E-02	--
Dioxin/Furan	0.4 ng/dscm TEQ	228,000 dscf/min[c]	3.41E-07	--
		Annual Average		
Particulate Matter (PM)[a]	0.063 lb/ton DKF	3,723,000 TPY DKF	--	117.3
Particulate Matter (PM_{10})[a]	0.053 lb/ton DKF	3,723,000 TPY DKF	--	98.7
Sulfur Dioxide	0.50 lb/ton CP	2,190,000 TPY CP	--	548
Nitrogen Oxides	2.17 lb/ton CP	2,190,000 TPY CP	--	2,376
Carbon Monoxide	2.0 lb/ton CP	2,190,000 TPY CP	--	2,190
Volatile Organic Compounds	0.16 lb/ton CP	2,190,000 TPY CP	--	175
Mercury	1.05E-04 lb/ton CP	2,190,000 TPY CP	--	0.115
Dioxin/Furan	3.41E-07 lb/hr	8,760 hr/yr	--	1.50E-06

Note: DKF = Dry Kiln Feed
CP = Clinker Production
TPH = tons per hour
TPY = tons per year

[a] Includes Coal Mill emissions during concurrent operation of Kiln/Cooler/Raw Mill and Coal Mill.
[b] Emission limits based on Permit No. 0250029-017-AC/PSD-FL-360.
[c] Flow rate @ 7% O_2.

ATTACHMENT TM-EU4-I1

PROCESS FLOW DIAGRAM



Raw Mill & Pyroprocessing Unit [EU028]

DESCRIPTION Attachment TM-EU4-I1 Process Flow Diagram	TITLE: **PENNSUCO CEMENT** FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	LEGEND Air Flow Solid Matter

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ATTACHMENT TM-EU4-I2

FUEL ANALYSIS OR SPECIFICATION

ATTACHMENT TM-EU4-12
FUEL ANALYSIS SPECIFICATION

Parameter	No. 6 Residual Fuel Oil[a]	Coal	Petroleum Coke	No. 2 Distillate Fuel Oil[a]
Moisture	--	8.5%	12%	--
Density	8.0 lb/gal	--	--	7.2 lb/gal
Heating Value	152,000 Btu/gal	12,500 Btu/lb	14,200 Btu/lb	138,800 Btu/gal
Nitrogen	0.5%	1.1%	--	0.5%
Sulfur	2% Max	3.5%	5.5%	0.5% Max
Ash/Inorganic	0-10	20%	1.0%	0-10

[a] Can include on-spec used oil.

ATTACHMENT TM-EU4-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU4-I3
CONTROL EQUIPMENT INFORMATION FOR RAW MILL AND PYROPROCESSING UNIT

Source ID	Baghouse ID No.	Manufacturer	Model No.	Flow Rate acfm	Flow Rate dscfm	Cloth Area (ft^2)	Air to Cloth Ratio
Kiln/Cooler/Raw Mill[d]	331.BF200	FLS Airtech	2M5C690D16(6)	515,000	228,000	173,397	3.0
Kiln Dust Conveyance and Storage Bin	331.BF740	FLS Airtech	100C10	4,250	2,953	1,302	3.3
Clinker Feed (CF) Silo	341.BF350	FLS Airtech	64C10	3,760	3,112	833	4.5
Raw Meal Conveyance (CF Silo)	351.BF410	FLS Airtech	64C10	4,000	3,310	833	4.8
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF440	FLS Airtech	100C10	4,760	3,939	1,300	3.7
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF470	FLS Airtech	100C10	4,100	3,409	1,302	3.1
Kiln Dust Truck Loadout	331.BF645	Midwest	MVL54H	3,500	2,910	1,167	3.0

ATTACHMENT TM-EU4-IV1

IDENTIFICATION OF APPLICABLE REQUIREMENTS

ATTACHMENT TM-EU4-IV1

LIST OF APPLICABLE REGULATIONS
FOR THE RAW MILL AND PYROPROCESSING UNIT

62-296.320(4)(a) – Process Weight Table

62-296.407 – Portland Cement Plants

62-296.507(4)(b)8 – RACT Requirements for Major VOC and NO_x Emitting Facilities

40 CFR 63.1342 – NESHAPs Subpart LLL – Standards: General

40 CFR 63.1343 – NESHAPs Subpart LLL – Standards for Kilns/Raw Mills

40 CFR 63.1344 – NESHAPs Subpart LLL – Operating limits for Kilns/Raw Mills

40 CFR 63.1345 – NESHAPs Subpart LLL – Standards for Clinker Coolers

40 CFR 63.1347 – NESHAPs Subpart LLL – Standards for Raw and Finish Mills

40 CFR 63.1348 – NESHAPs Subpart LLL – Material Handling Sources Opacity Limit

40 CFR 63.1349 – NESHAPs Subpart LLL – Performance Testing

40 CFR 63.1350 – NESHAPs Subpart LLL – Monitoring

40 CFR 63.1351 – NESHAPs Subpart LLL – Compliance Dates

40 CFR 63.1356 – NESHAPs Subpart LLL – Exemption from NSPS

40 CFR 63 – NESHAPs Subpart A – General Provisions

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

ATTACHMENT TM-EU4-IV3

ALTERNATIVE METHODS OF OPERATION

ATTACHMENT TM-EU4-IV3

ALTERNATIVE METHODS OF OPERATION

The pyroprocessing system consists of the preheater/calciner, kiln, and the cooler. The maximum heat input rates for the preheater/calciner and kiln are 385 and 290 MMBtu per hour, respectively. The calciner and the kiln are permitted to fire natural gas, bituminous coal, petroleum coke, No. 2 fuel oil with used oil blend, and No. 6 fuel oil with used oil blend. The hours of operation are not limited (8,760 hours per year).

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Raw Material Handling

3. Emissions Unit Identification Number: **029**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Raw material feed storage silos and handling.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (4)

   Process Enclosures

2. Control Device or Method Code(s): **018, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	
2. Maximum Production Rate: **3,723,000 TPY (dry)**	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

Maximum production rate represents total dry kiln feed on an annual basis.

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 029**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **4 baghouses. See Attachment TM-EU5-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **H**	6. Stack Height: **92** feet	7. Exit Diameter: **1.58 x 1.58** feet
8. Exit Temperature: **92** °F	9. Actual Volumetric Flow Rate: **8,500** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: **8,130** dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Stack parameters are for Baghouse 311.BF650. See Attachment TM-EU5-C15 for stack parameters of other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 1

1. Segment Description (Process/Fuel Type): **Raw Material Transfer**		
2. Source Classification Code (SCC): **3-05-006-12**	3. SCC Units: **Tons Transferred or Handled**	
4. Maximum Hourly Rate: **425**	5. Maximum Annual Rate: **3,723,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Process rate is material feed on a dry basis. Equivalent to 250 TPH and 2,190,000 TPY clinker production.**		

Segment Description and Rate: Segment _____ of _____

1. Segment Description (Process/Fuel Type):		
2. Source Classification Code (SCC):	3. SCC Units:	
4. Maximum Hourly Rate:	5. Maximum Annual Rate:	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment:		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	018	NS
PM_{10}	054	018	NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **3.0** lb/hour **13.0** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.0095 gr/dscf** Reference: **Vendor Information**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU5-F1.8 for emission calculation.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **3.0** lb/hour **13.0** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **100 percent of PM** Reference:	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU5-F1.8 for emission calculations.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 2

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **5 %** Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Monthly VE test using EPA Method 22. EPA Method 9 if visible emissions are observed during Method 22 testing.**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC/PSD-FL-360.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 2

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **10 %** Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **40 CFR 63.1348.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU5-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU5-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU5-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU5-C15

SUMMARY OF STACK PARAMETER DATA

ATTACHMENT TM-EU5-C15
SUMMARY OF STACK PARAMETER DATA FOR THE RAW MATERIAL HANDLING AND STORAGE (EU 029)

Emission Unit	Baghouse ID No.	Stack Height (ft)	Vent Size (in)	Exhaust Flow Rate (acfm)	Exhaust Temperature (^{o}F)
Raw Material Feed Bins and Conveyors	311.BF650	92	19 x 19	8,500	92
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF750	17	18 x 27	7,750	92
Raw Material Conveyors (Feed Bins to Raw Mill)	321.BF470	100	17 x 21	10,800	108
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF950	68	20 x 30	11,700	108

ATTACHMENT TM-EU5-F1.8

EMISSION CALCULATIONS

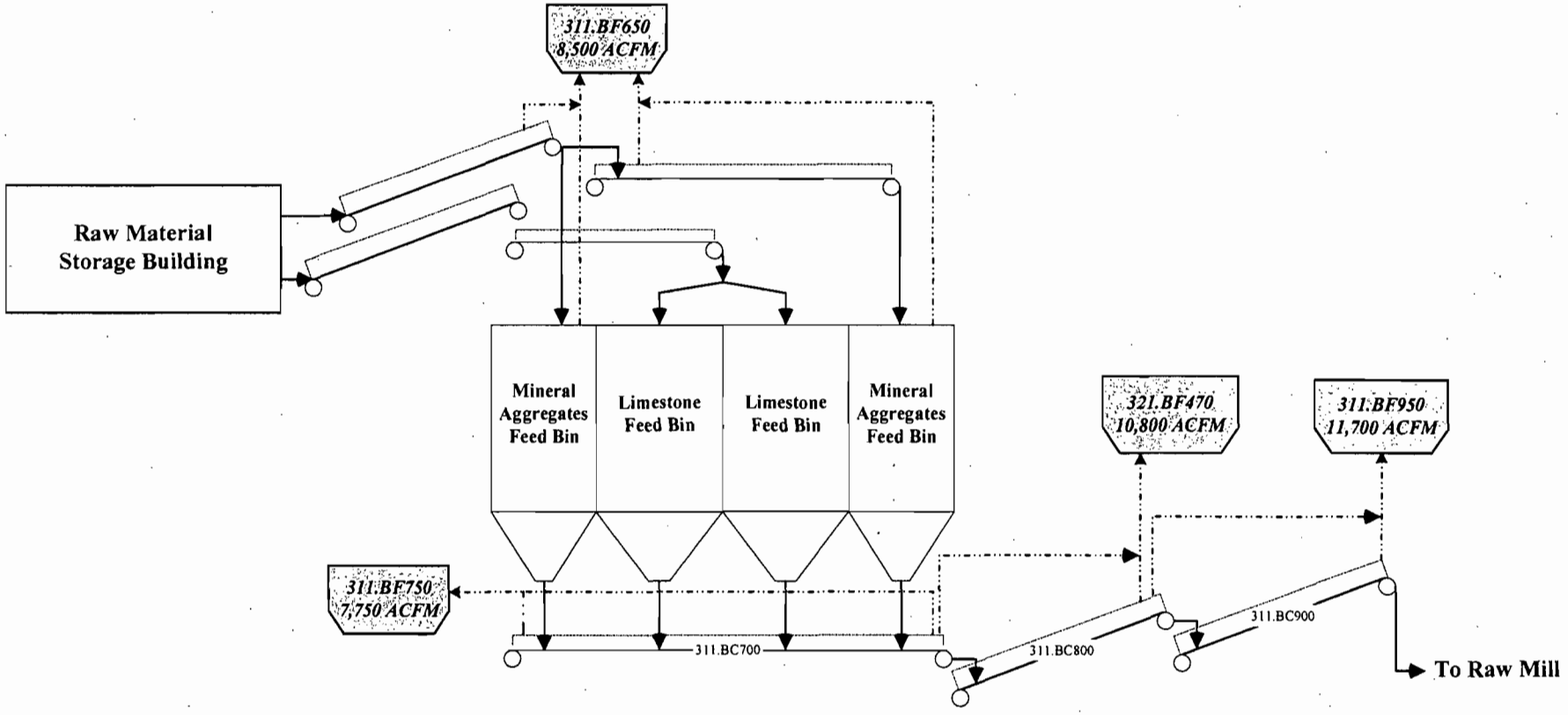
ATTACHMENT TM-EU5-F1.8
RAW MATERIAL HANDLING AND STORAGE (EU 029) POTENTIAL EMISSION RATES

Emission Unit	Equip. ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate acfm	Exhaust Flow Rate dscfm	Temperature (°F)	Potential PM/PM10 Emission Rate[a] gr/dscf	lb/hr	TPY
Raw Material Feed Bins and Conveyors	311.BF650	8,760	8,500	8,130	92	0.0095	0.66	2.90
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF750	8,760	7,750	7,413	92	0.0095	0.60	2.64
Raw Material Conveyors (Feed Bins to Raw Mill)	321.BF470	8,760	10,800	10,039	108	0.0095	0.82	3.58
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF950	8,760	11,700	10,876	108	0.0095	0.89	3.88
					Potential Emission Rates =		**2.97**	**13.00**

[a] PM_{10} emission rate calculated as 100 percent of PM emission rate.

ATTACHMENT TM-EU5-I1

PROCESS FLOW DIAGRAM



Raw Materials Handling [EU029]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU5-I1 Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter

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ATTACHMENT TM-EU5-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU5-I3
CONTROL EQUIPMENT INFORMATION FOR RAW MATERIAL HANDLING (EU029)

Source ID	Baghouse ID No.	Manufacturer	Model No.	Flow Rate acfm	Flow Rate dscfm	Cloth Area (ft^2)	Air to Cloth Ratio
Raw Material Feed Bins and Conveyors	331.BF650	FLS Airtech	144C10	8,500	8,130	1,875	4.5
Raw Material Conveyors (Feed Bins to Raw Mill)	331.BF750	FLS Airtech	144C10	7,750	7,413	1,875	4.1
Raw Material Conveyors (Feed Bins to Raw Mill)	341.BF470	FLS Airtech	225C10	10,800	10,039	2,930	3.7
Raw Material Conveyors (Feed Bins to Raw Mill)	351.BF950	FLS Airtech	225C10	11,700	10,876	2,930	4.0

ATTACHMENT TM-EU5-IV1

LIST OF APPLICABLE REGULATIONS

ATTACHMENT TM-EU5-IV1

LIST OF APPLICABLE REGULATIONS FOR RAW MATERIAL HANDLING

62-296.320(4)(b) – General VE Standard

62-297.620(4), F.A.C. – 5-percent Opacity Limit in Lieu of Stack Testing

40 CFR 63.1342 – NESHAPs Subpart LLL – Standards: General

40 CFR 63.1348 – NESHAPs Subpart LLL – Material Handling Sources Opacity Limit

40 CFR 63.1349 – NESHAPs Subpart LLL – Performance Testing

40 CFR 63.1350 – NESHAPs Subpart LLL – Monitoring

40 CFR 63.1351 – NESHAPs Subpart LLL – Compliance Dates

40 CFR 63.1356 – NESHAPs Subpart LLL – Exemption from NSPS

40 CFR 63 – NESHAPs Subpart A – General Provisions

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Cement Storage Silos 1-12, Packhouse & Bulk Loadout Units 1-3

3. Emissions Unit Identification Number: **014, 015, and 016**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003***	**June 2004***	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Emission unit consists of Cement Storage Silos (EU 014), Cement Distribution Rail/Truck Loadout Unit Nos. 1, 2, and 3 (EU 015), and Cement Packhouse (EU 016).

    *** For new Cement Storage Silos. Date is March 2005 for new Packhouse Commence Construction, and Sept. 2005 for new Packhouse Startup Date.**

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (13)

   Process Enclosures

2. Control Device or Method Code(s): **018, 054**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **500 TPH**	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

Maximum process rate is a 24-hour block average and is limited by Permit No. 0250020-017-AC/PSD-FL-360. See Attachment TM-EU6-B6 for maximum individual process rates.

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 014, 015, 016**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **13 baghouses. See Attachment TM-EU6-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **V**	6. Stack Height: **200** feet	7. Exit Diameter: **1** feet
8. Exit Temperature: **200** °F	9. Actual Volumetric Flow Rate: **18,000** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Stack parameters are for Baghouse F-511. Refer to Attachment TM-EU6-C15 for stack parameters of other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing Dry Process; Cement storage silos**		
2. Source Classification Code (SCC): **3-05-006-18**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **500**	5. Maximum Annual Rate: **4,380,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Hourly rate refers to process input rate to each cement silo as stated in Permit No. 0250020-017-AC/PSD-FL-360.** **Annual rate = 500 TPH x 8,760 hr/yr = 4,380,000 TPY.**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Cement Manufacturing Dry Process; Cement Loadout**		
2. Source Classification Code (SCC): **3-05-006-19**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **500**	5. Maximum Annual Rate: **4,380,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Hourly rate refers to each cement loadout operation as stated in Permit No. 0250020-017-AC/PSD-FL-360. Packhouse production rate limited to 170 tons/hr.**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	018	NS
PM_{10}	054	018	NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **7.1** lb/hour **30.9** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.01 gr/acf** Reference: **Manufacturer Info.**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU6-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **7.1** lb/hour **30.9** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **0.01 gr/acf** Reference: **Manufacturer Information**	7. Emissions Method Code: **5**
8. Calculation of Emissions: **See Attachment TM-EU6-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 2

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **5 %** Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Monthly VE test using EPA Method 22. EPA Method 9 if visible emissions are observed during Method 22 testing.**	
5. Visible Emissions Comment: **Permit No. 0250020-017-AC/PSD-FL-360.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 2

1. Visible Emissions Subtype: **VE10**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **10 %** Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **Annual VE test, EPA Method 9**	
5. Visible Emissions Comment: **40 CFR 63.1348.**	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU6-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU6-I3** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☒ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU1-I5** ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU6-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU6-B6

INDIVIDUAL MAXIMUM PROCESS RATES FOR CEMENT/STORAGE/PACKHOUSE

ATTACHMENT TM-EU6-B6
INDIVIDUAL MAXIMUM PROCESS RATES FOR CEMENT STORAGE/LOADOUT/PACKHOUSE
(EU 014, 015, AND 016)

Source	EU ID	Maximum Operating Hours (hr/yr)	Maximum Process Rate	
			TPH[a]	TPY[b]
Cement Silos 1-6	014	8,760	500	4,380,000
Cement Silos 7-9	014	8,760	500	4,380,000
Cement Silo 10-12	014	8,760	500	4,380,000
Bulk Loadout Unit 1	015	8,760	500	4,380,000
Bulk Loadout Unit 2	015	8,760	500	4,380,000
Bulk Loadout Unit 3	015	8,760	500	4,380,000
Packhouse	016	8,760	170	1,489,200

[a] Represents maximum process input rate for EU 014 and 015; represents maximum production rate for EU 016.

[b] Represents hourly process rate times 8,760 hr/yr.

ATTACHMENT TM-EU6-C15

SUMMARY OF STACK PARAMETER DATA

ATTACHMENT TM-EU6-C15
SUMMARY OF STACK PARAMETER DATA
CEMENT STORAGE/LOADOUT/PACKHOUSE BAGHOUSES

Emission Unit	Baghouse ID No.	Stack Height (ft)	Stack Diameter[a] (ft)	Exhaust Flow Rate (acfm)	Exhaust Temperature (°F)
Cement Silos 1-6	F-511	200	1	18,000	200
Cement Silos 7-9	F-512	200	1	10,000	200
Cement Silo 10	F-513	200	1	5,000	200
Cement Silo 11	F-514	200	1	5,000	200
Cement Silo 12	F-515	200	1	5,000	200
Bulk Loadout - Unit 1	B-210	30	1	2,500	200
Bulk Loadout - Unit 2	B-110	30	1	2,500	200
Bulk Loadout - Unit 3	B-372	12	1	2,000	200
Bulk Loadout - Unit 3	B-374	12	1	2,000	200
Bulk Loadout - Unit 3	B-382	86	1	5,100	200
Packhouse	BF-120	30	1.5	4,000	200
Packhouse	BF-200	60	1.5	6,200	200
Packhouse	BF-400	6	1.5	15,000	200

[a] Stack for baghouses B-110 and B-210 are circular; all other baghouse stacks are rectangular. For rectangular stacks, approximate effective stack diameter is shown.

ATTACHMENT TM-EU6-F1.8

EMISSION CALCULATIONS

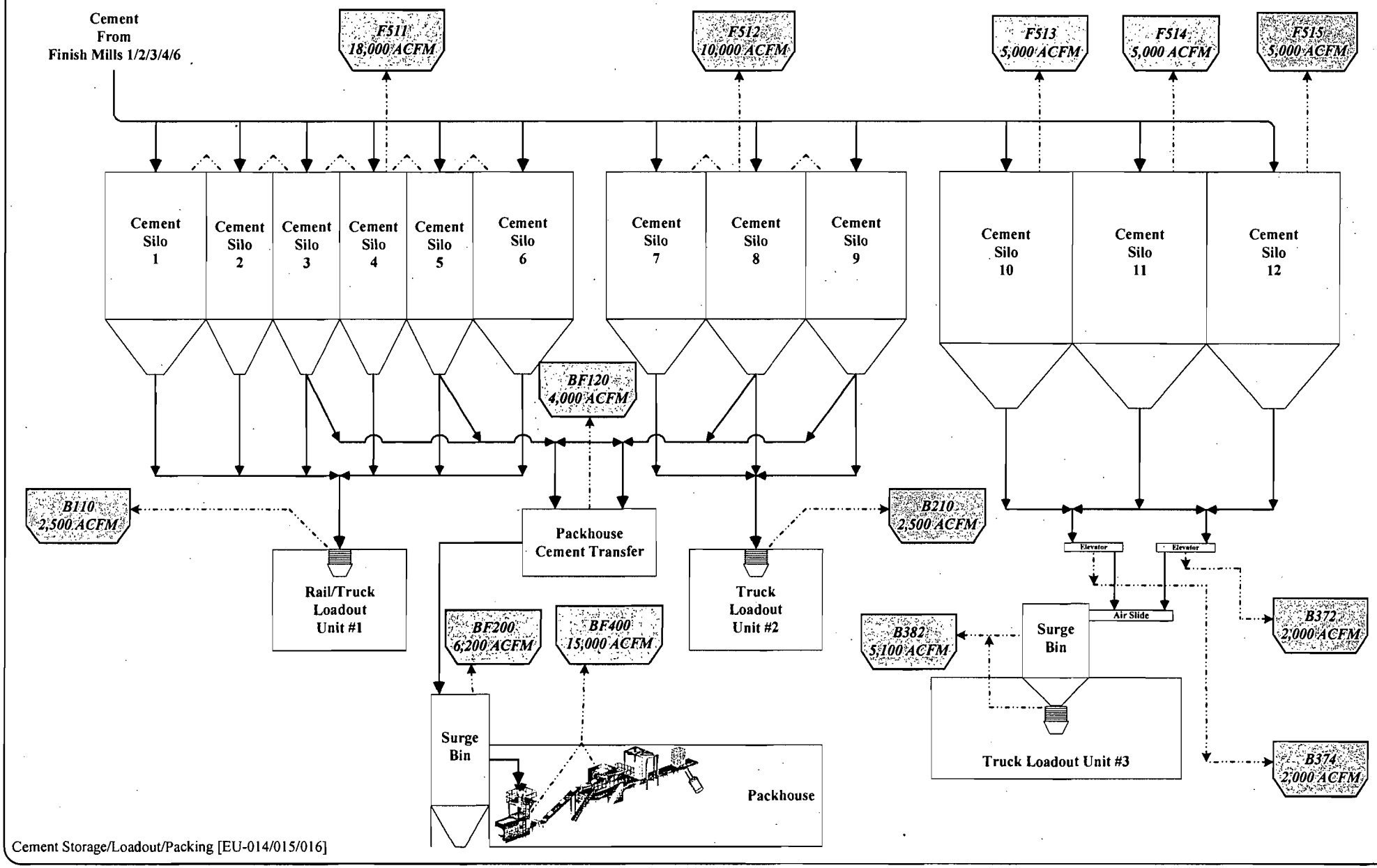
ATTACHMENT TM-EU6-F1.8
CEMENT STORAGE/LOADOUT/PACKHOUSE (EU ID NOS. 014, 015, AND 016)
POTENTIAL EMISSION RATES

Emission Unit	Baghouse ID No.	Operating Hours (hr/yr)	Exhaust Flow Rate (acfm)	Potential PM/PM_{10} Emission Rate[a]		
				gr/acf	lb/hr	TPY
Cement Silos 1-6	F-511	8,760	18,000	0.01	1.54	6.76
Cement Silos 7-9	F-512	8,760	10,000	0.01	0.86	3.75
Cement Silo 10	F-513	8,760	5,000	0.01	0.43	1.88
Cement Silo 11	F-514	8,760	5,000	0.01	0.43	1.88
Cement Silo 12	F-515	8,760	5,000	0.01	0.43	1.88
Bulk Loadout - Unit 1	B-110	8,760	2,500	0.01	0.21	0.94
Bulk Loadout - Unit 2	B-210	8,760	2,500	0.01	0.21	0.94
Bulk Loadout - Unit 3	B-372	8,760	2,000	0.01	0.17	0.75
Bulk Loadout - Unit 3	B-374	8,760	2,000	0.01	0.17	0.75
Bulk Loadout - Unit 3	B-382	8,760	5,100	0.01	0.44	1.91
Packhouse	BF-120	8,760	4,000	0.01	0.34	1.50
Packhouse	BF-200	8,760	6,200	0.01	0.53	2.33
Packhouse	BF-400	8,760	15,000	0.01	1.29	5.63
			Potential Emission Rates =		**7.05**	**30.90**

[a] PM_{10} emission rate calculated as 100 percent of PM emissions.

ATTACHMENT TM-EU6-I1

PROCESS FLOW DIAGRAM



Cement Storage/Loadout/Packing [EU-014/015/016]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU6-I1 Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter

TITAN AMERICA

ATTACHMENT TM-EU6-I3

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU6-I3

CONTROL EQUIPMENT INFORMATION FOR CEMENT STORAGE AND LOADOUT BAGHOUSES

Source ID	Baghouse ID	Manufacturer	Model No.	Number of Bags	Flow Rate (acfm)	Cloth Area (ft^2)	Air to Cloth Ratio
Cement Silos 1-6	F-511	BHA	-	156	18,000	1,625	11.1
Cement Silos 7-9	F-512	BHA	-	156	10,000	2,142	4.7
Cement Silo 10	F-513	Mikropul	121S-10-20B	121	5,000	1,424	3.5
Cement Silo 11	F-514	Mikropul	121S-10-20B	121	5,000	1,424	3.5
Cement Silo 12	F-515	Mikropul	121S-10-20B	121	5,000	1,424	3.5
Bulk Loadout Unit 1	B-210	BHA	-	72	2,500	1,591	1.6
Bulk Loadout Unit 2	B-110	BHA	-	72	2,500	1,591	1.6
Bulk Loadout Unit 3 Line 1	B-372	Mikropul	36S-8-30-C	36	2,000	340	5.9
Bulk Loadout Unit 3 Line 2	B-374	Mikropul	36S-8-30-C	36	2,000	340	5.9
Bulk Loadout Unit 3 Airslide	B-382	Mikropul	121S-10-20C	121	5,100	1,424	3.5
Packhouse	BF-120	FLS Airtech	100TA8	100	4,000	1,047	3.8
Packhouse	BF-200	FLS Airtech	144TA8	144	6,200	1,508	4.1
Packhouse	BF-400	FLS Airtech	304C10	304	15,000	3,958	3.8

ATTACHMENT TM-EU6-IV1

LIST OF APPLICABLE REGULATIONS

ATTACHMENT TM-EU6-IV1

LIST OF APPLICABLE REGULATIONS
FOR THE CEMENT STORAGE, LOADOUT, AND PACKHOUSE

62-297.620(4), F.A.C. – 5-percent Opacity Limit in Lieu of Stack Testing

40 CFR 63.1342 – NESHAPs Subpart LLL – Standards: General

40 CFR 63.1348 – NESHAPs Subpart LLL – Material Handling Sources Opacity Limit

40 CFR 63.1349 – NESHAPs Subpart LLL – Performance Testing

40 CFR 63.1350 – NESHAPs Subpart LLL – Monitoring

40 CFR 63.1351 – NESHAPs Subpart LLL – Compliance Dates

40 CFR 63.1356 – NESHAPs Subpart LLL – Exemption from NSPS

40 CFR 63 – NESHAPs Subpart A – General Provisions

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

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If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Concrete Block Plant (5,500 blocks/hr)

3. Emissions Unit Identification Number: **024**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A			**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Concrete block plant with 3 aggregate storage silos and 2 cement silos producing 5,500 blocks per hour (blocks/hr).

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (6)

2. Control Device or Method Code(s): **018**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	
2. Maximum Production Rate: **5,500 blocks/hr**	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
20 hours/day	**6** days/week
52 weeks/year	**6,240** hours/year
6. Operating Capacity/Schedule Comment:	

Production rate equivalent to approximately 96.25 tons/hr concrete block.

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 024**	2. Emission Point Type Code: **3**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **6 baghouses. See Attachment TM-EU7-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **H**	6. Stack Height: **50** feet	7. Exit Diameter: **<1** feet
8. Exit Temperature: **77** °F	9. Actual Volumetric Flow Rate: **1,600** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **Stack parameters are for the cement silo baghouses. See Attachment TM-EU7-C15 for stack parameters for other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 1

1. Segment Description (Process/Fuel Type): **Mineral Products; Concrete Batching; General: Non-fugitive.**		
2. Source Classification Code (SCC): **3-05-011-01**	3. SCC Units: **Cubic Yards of Concrete**	
4. Maximum Hourly Rate: **±51**	5. Maximum Annual Rate: **320,320**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Emission unit operates at 5,500 blocks/hr. Cubic yard rates are estimated by process knowledge.**		

Segment Description and Rate: Segment _____ of _____

1. Segment Description (Process/Fuel Type):		
2. Source Classification Code (SCC):	3. SCC Units:	
4. Maximum Hourly Rate:	5. Maximum Annual Rate:	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment:		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	018		NS
PM_{10}	018		NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control: **99%**
3. Potential Emissions: **0.43** lb/hour **0.19** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Baghouse efficiency of 99%** Reference: **AP-40, AP-42, and BEP**	7. Emissions Method Code: **3**
8. Calculation of Emissions: **See Attachment TM-EU7-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.27** lb/hour **0.12** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Baghouse efficiency of 99 percent** Reference: **AP-42 and BEP**	7. Emissions Method Code: **3**
8. Calculation of Emissions: **See Attachment TM-EU7-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 1

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **Rule 62-296.414, F.A.C.**	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU7-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU7-C15** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU7-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU7-C15

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU7-C15

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

PENNSUCO CONCRETE BLOCK PLANT

Source ID	Manufacturer	Model No.	Number of Bags	Flow Rate (acfm)	Cloth Area (ft^2)	Air to Cloth Ratio
Cement Silo No. 1	C&W Mfg.	CP-310 (2 units)	4	1,600	304	5.3
Cement Silo No. 2	C&W Mfg.	CP-310 (2 units)	4	1,600	304	5.3
Weigh Hopper No. 1	C&W Mfg.	CP-100	1	400	110	4.0
Weigh Hopper No. 2	C&W Mfg.	CP-100	1	400	110	4.0

ATTACHMENT TM-EU7-F1.8

EMISSION CALCULATIONS

PM EMISSION CALCULATIONS

PRODUCTION RATE: **5,500 blocks/hour** (96.25 ton/hr, ± 51 yd^3/hr)
[maximum] 20 hrs/day, 6 days/wk, 52 wks/yr = **6,240 hrs/yr**

MATERIAL USE:
[maximum]
cement = 8.53 tons/hr
sand & aggregate = 81.68 tons/hr

UNLOADINGS:
[maximum]
cement $\frac{53{,}227 \text{ tons/yr}}{25 \text{ tons/unloading}}$ = 2,129 unloadings/yr
assumes ±45 minutes/unloading with an unloading rate of ±30 tons/hour

UNCONTROLLED PM EMISSIONS:
Factors taken from Table 11.12-2 of AP-42, Fifth Edition, Concrete Batching. EPA October 2001

▸ cement silos:	(2@ 30.0 tons/hr) x (0.72 lb/ton mtl)	=	43.20 lb/hr
	(53,227 tons/yr) x (0.72 lb/ton mtl)	=	19.16 ton/yr
▸ weigh hopper/mixer:	(2@ 8.53 tons/hr) x (0.0051 lb/ton mtl)	=	0.09 lb/hr
	(53,227 tons/yr) x (0.0051 lb/ton mtl)	=	0.14 ton/yr

■ **TOTAL UNCONTROLLED PM EMISSIONS [MAXIMUM]**	=	**43.29 lb/hr**
	=	**19.30 ton/yr**

CONTROLLED EMISSIONS: based on baghouse efficiency of 99% (AP-40, AP-42 & BEP)

▸ cement silos:	(43.20 lb/hr) x (1 - 0.99)	=	0.43 lb/hr
	(19.16 ton/yr) x (1 – 0.99)	=	0.19 ton/yr
▸ weigh hopper/mixer:	(0.09 lb/hr) x (1 - 0.99)	=	<0.01 lb/hr
	(0.14 ton/yr) x (1 – 0.99)	=	<0.01 ton/yr

■ **TOTAL CONTROLLED PM EMISSIONS [MAXIMUM]**	=	**0.43 lb/hr**
	=	**0.19 ton/yr**

UNCONFINED EMISSIONS:

▸ aggregates — unconfined particulate emissions from transfer to storage bins will be negligible; materials are kept wet from sprinklers, covered conveyors, or inherent moisture of materials

▸ vehicle traffic — unconfined particulate emissions from vehicular traffic on unpaved roads or yard areas controlled as necessary by application of water or dust suppressants or other reasonable precautions

DESCRIPTION	TITLE: PENNSUCO BLK	TITAN AMERICA
ATTACHMENT TM-EU7-F1.8a	FILE: 0537642/4.4/TM-EU7-F1.8a.doc	
EMISSION CALCULATIONS	LAST REVISION DATE: **2/1/20006**	

PM_{10} EMISSION CALCULATIONS

PRODUCTION RATE: **5,500 blocks/hour** (96.25 ton/hr, ± 51 yd^3/hr)
[maximum] 20 hrs/day, 6 days/wk, 52 wks/yr = **6,240 hrs/yr**

MATERIAL USE:
[maximum]

cement	=	8.53 tons/hr
sand & aggregate	=	81.68 tons/hr

UNLOADINGS: cement $\frac{53{,}227 \text{ tons/yr}}{25 \text{ tons/unloading}}$ = 2,129 unloadings/yr
[maximum]
assumes ±45 minutes/unloading with an unloading rate of ±30 tons/hour

UNCONTROLLED PM_{10} EMISSIONS:
Factors taken from Table 11.12-2 of AP-42, Fifth Edition, Concrete Batching. EPA October 2001

▸ cement silos:	(2@ 30.0 tons/hr) x (0.46 lb/ton mtl)	=	27.6 lb/hr
	(53,227 tons/yr) x (0.46 lb/ton mtl)	=	12.24 ton/yr
▸ weigh hopper/mixer:	(2@ 8.53 tons/hr) x (0.0024 lb/ton mtl)	=	0.04 lb/hr
	(53,227 tons/yr) x (0.0024 lb/ton mtl)	=	0.06 ton/yr

■ **TOTAL UNCONTROLLED PM_{10} EMISSIONS [MAXIMUM]**	=	**27.64 lb/hr**
	=	**12.3 ton/yr**

CONTROLLED EMISSIONS: based on baghouse efficiency of 99% (AP-40, AP-42 & BEP)

▸ cement silos:	(27.6 lb/hr) x (1 - 0.99)	=	0.28 lb/hr
	(12.24 ton/yr) x (1 – 0.99)	=	0.12 ton/yr
▸ weigh hopper/mixer:	(0.04 lb/hr) x (1 - 0.99)	=	<0.01 lb/hr
	(0.06 ton/yr) x (1 – 0.99)	=	<0.01 ton/yr

■ **TOTAL CONTROLLED PM_{10} EMISSIONS [MAXIMUM]**	=	**0.27 lb/hr**
	=	**0.12 ton/yr**

UNCONFINED EMISSIONS:

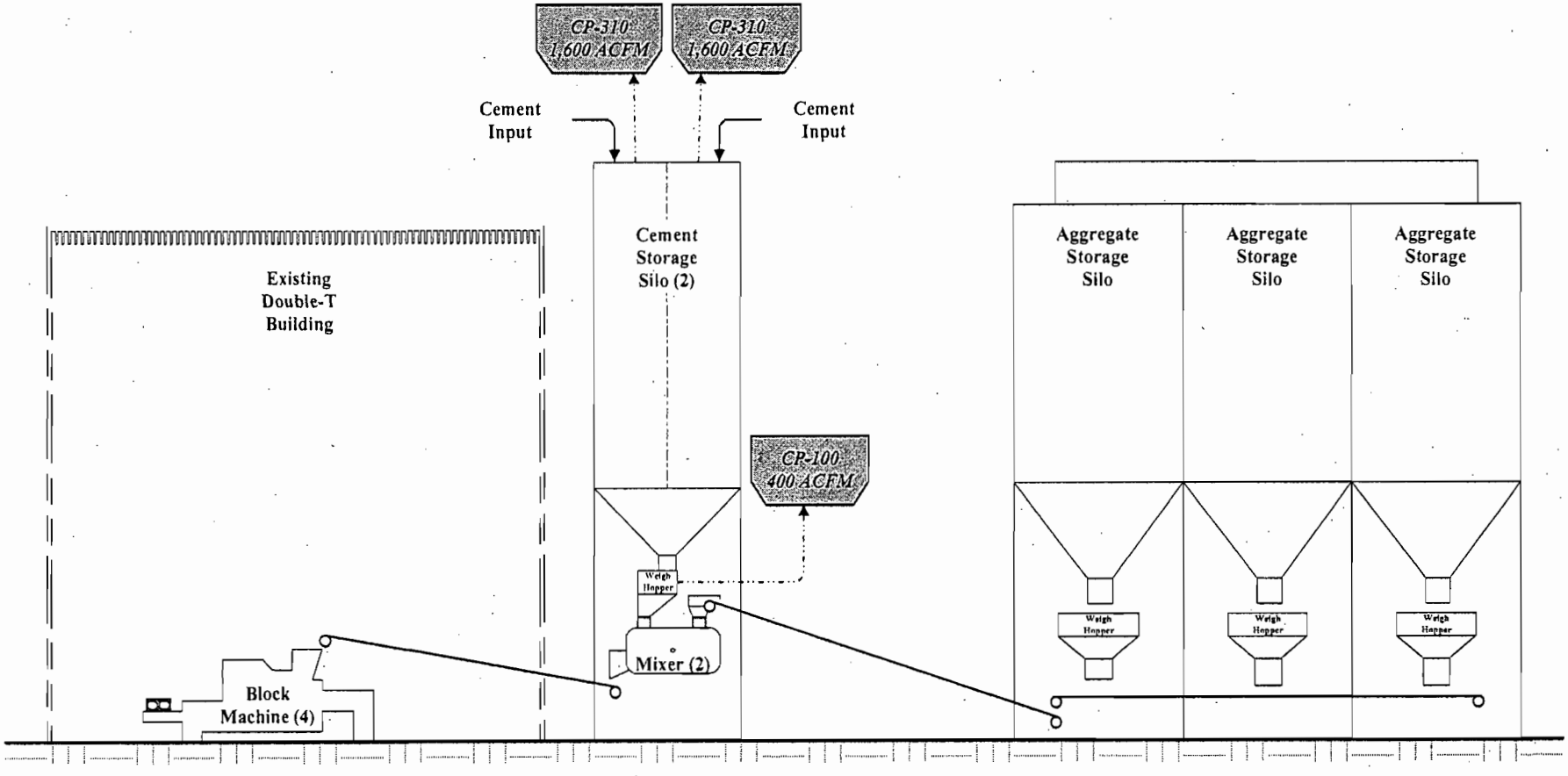
▸ aggregates — unconfined particulate emissions from transfer to storage bins will be negligible; materials are kept wet from sprinklers, covered conveyors, or inherent moisture of materials

▸ vehicle traffic — unconfined particulate emissions from vehicular traffic on unpaved roads or yard areas controlled as necessary by application of water or dust suppressants or other reasonable precautions

DESCRIPTION	TITLE: PENNSUCO BLK	TITAN AMERICA
ATTACHMENT TM-EU7-F1.8b	FILE: 0537642/4.4/TM-EU7-F1.8b.doc	
EMISSION CALCULATIONS	LAST REVISION DATE: **2/1/2006**	

ATTACHMENT TM-EU7-I1

PROCESS FLOW DIAGRAM



Pennsuco Block Plant [EU-024]

DESCRIPTION			
Attachment TM-EU7-I1 Process Flow Diagram	TITLE: PENNSUCO CEMENT FILENAME: 0537642/4:4/PlotPlans.vsd LAST REVISION DATE: 2/1/2006	LEGEND Air Flow Solid Matter	TITAN AMERICA

ATTACHMENT TM-EU7-IV1

LIST OF APPLICABLE REGULATIONS

ATTACHMENT TM-EU7-IV1

LIST OF APPLICABLE REGULATIONS FOR THE CONCRETE BLOCK PLANT

62-296.320(4)(b) – General VE Standard

62-296.414, F.A.C. – Batch Plant Visible Emissions Standards

MIAMI-DADE COUNTY, FLORIDA

MIAMI-DADE

DERM

ENVIRONMENTAL RESOURCES MANAGEMENT
AIR QUALITY MANAGEMENT DIVISION
33 S.W. 2nd AVENUE
SUITE 900
MIAMI, FLORIDA 33130-1540
TELEPHONE: (305) 372-6925
FAX: (305) 372-6954

September 20, 2002

NOTICE OF AIR POLLUTION PERMIT

CERTIFIED MAIL NO.: 7000 0600 0025 3506 2242
RETURN RECEIPT REQUESTED

ISSUED TO:

Mr. Hardy Johnson
President, Florida Division
Tarmac America, LLC
455 Fairway Drive
Deerfield Beach, FL 33441

Permit Number: 0250020-014-AC
Issue Date: **September 20, 2002**
Expiration Date: September 19, 2003

Project: An Air Construction Permit to construct a concrete block plant at Tarmac Pennsuco.
Facility Description: Facility is a Portland Cement Manufacturing Facility.
(SIC/NAICS # - 3241/32731, 3271/327331, 3273/32732, 1422/212312, 1442/212321)
Location: 11000 NW 121 Way
Lat./Long.: 25° 52' 30" N / 80° 22' 30" W.

Dear Mr. Johnson:

This is Permit Number 0250020-014-AC to construct an air pollution source issued by the **Miami-Dade County, Department of Environmental Resources Management (DERM) pursuant to Chapter 24, Code of Miami-Dade County and Chapter 403.087, Florida Statutes (F.S.).** This is a construction permit authorizing the construction of the emissions units described in the permit.

The Florida Department of Environmental Protection (FDEP) has permitting jurisdiction under Section 403.087, Florida Statutes (F.S.). However, in accordance with Section 403.182, F.S., the FDEP recognizes the DERM as the approved local air pollution control program of Miami-Dade County. Through a Specific Operating Agreement, the FDEP delegated to the DERM the authority to issue or deny permits for this type of air pollution source located in Miami-Dade County.

STATEMENT OF BASIS:

This permit is issued under the provisions of **Chapter 24, Code of Miami-Dade County, Chapter 403, Florida Statutes (F.S.), and Florida Administrative Code (F.A.C.) Rules 62-4, and 62-204 through 62-297,** and in conformance with all existing regulations of the FDEP and the DERM rules. The above named permittee is hereby authorized to perform the work or construct the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the DERM and made a part hereof and specifically described in this permit.

PERMIT CONTENTS:

Part I -- Summary Information
Part II -- Facility-Wide Specific Conditions
Part III -- Emission Unit Specific Conditions
Appendix A – General Conditions

PART I -- SUMMARY INFORMATION

This permit addresses the following air pollution emission unit(s):

Emissions Unit Number	Emissions Unit Description
026	Concrete Block Plant

SIGNIFICANT DATES:

Public Notice of Intent Published September 4, 2002
Additional Information Received July 25, 2002
Letter from FDEP dated July 19, 2002 regarding PSD Applicabilty Determination
Application Received on July 1, 2002

PERMIT HISTORY:

The facility operates under Title V Air Operation Permit No. 0250020-011-AV.
There have been no previous air permits issued for this emissions unit.

PART II -- FACILITY-WIDE SPECIFIC CONDITIONS

1.0 Administrative Requirements

1.1 Regulating Agencies: All applications, tests, reports, notifications, or other submittals required by this permit shall be submitted to the Miami-Dade County DERM, Air Facilities Section located at 33 SW 2nd Avenue, Suite 900, Miami, Florida 33130-1540.

1.2 Citation Format: In this permit, references to **F.A.C. Rule 62-xxx refer to rules promulgated under Title 62 of the Florida Administrative Code; references (if any) to 40 CFR 60.xx (or 61.xx or 63.xx) refer to regulations codified under Part 60 (or 61 or 63) of Title 40 of the Code of Federal Regulations.**

1.3 Specific and General Conditions: The permittee shall be subject to the specific conditions of this permit and the permittee shall be aware of, and operate under, the attached General Conditions, attached as Appendix A of this permit. General Conditions are binding and enforceable pursuant to Chapter 403, F.S. [Rule 62-4.160 F.A.C.]

1.4 Applicable Regulations: This facility is subject to regulation of Florida Administrative Code (F.A.C.) Rules 62-4, and 62-204 through 62-297. Issuance of this permit does not relieve the facility permittee from compliance with any other applicable federal, state, or local permitting requirements or other regulations.

1.5 Waste Disposal: The permittee shall treat, store, and dispose of all liquid, solid and hazardous wastes in accordance with all applicable federal, state and local regulations.

1.6 Other Permits: This air pollution permit does not preclude the permittee from obtaining any other types of required permits, licenses or certifications from the DERM or other departments or agencies.

1.7 Operation Permit Required: This permit authorizes construction and/or installation of the permitted emission unit(s) and initial operation to determine compliance with the FDEP and the DERM rules. An **operation permit is required for regular operation of the permitted emission units.** The permittee shall apply for and receive an operation permit prior to expiration of this permit. An application for an operation permit shall be submitted to the Miami-Dade County DERM, Air Facilities Section. To apply for an operation permit, the applicant shall submit the appropriate application fee and, in triplicate, the appropriate application form, a certification that construction was completed with a notation of any deviations from the conditions on the construction permit, compliance test results, and such additional information as the DERM may by law require.
[Rule 62-4.030, 62-4.050, 62-4.220, and 62-210.300 F.A.C.]

1.8 Extension of This Permit: The expiration date of this construction permit may be extended upon request of the permittee and submission of the appropriate fee to the Miami-Dade County DERM, Air Facilities Section **at least 60 days prior** to the expiration date of this permit.
[Rule 62-4.030, 62-4.050, and 62-4.220 F.A.C.]

2.0 General Pollutant Emission Limiting Standards

2.1 Objectionable Odor Prohibited: No person shall cause, suffer, allow, or permit the discharge of air pollutants, which cause or contribute to an objectionable odor.
[Rule 62-296.320(2) F.A.C.]

2.2 General Visible Emissions Standard: Unless otherwise specified by permit or rule, no person shall cause, let, permit, suffer or allow to be discharged into the atmosphere the emissions of air pollutants from any activity, the density of which is equal to or greater than 20 percent opacity at any time.
[Rule 62-296.320(4)(b) F.A.C.]

2.3 Volatile Organic Compounds/Organic Solvents Emissions: No person shall store, pump, handle, process, load, unload or use in any process or installation, volatile organic compounds or organic solvents without applying known and existing vapor emission control devices or systems deemed necessary and ordered by the DERM.

Such controls include the following:
- Tightly cover or close all VOC containers when they are not in use.
- Tightly cover all open tanks, which contain VOCs when they are not in use.
- Maintain all pipes, valves, fittings, etc., which handle VOCs in good operating condition.
- Confine rags used with VOCs to tightly closed, fireproof containers when not in use.
- Immediately confine and clean up VOC spills and make sure wastes are placed in closed containers for reuse, recycling or proper disposal.

[Rule 62-296.320(1) F.A.C.]

2.4 Unconfined Emissions of Particulate Matter: No person shall cause, let, permit, suffer or allow the emissions of unconfined particulate matter from any activity, including vehicular movement; transportation of materials; construction, alteration, demolition or wrecking; or industrially related activities such as loading, unloading, storing or handling; without taking reasonable precautions to prevent such emissions.

Reasonable precautions include the following:

- Paving and maintenance of roads, parking areas and yards.
- Application of water or chemicals to control emissions from such activities as demolition of buildings, grading roads, construction, and land clearing.

- Application of asphalt, water, chemicals, or other dust suppressants to unpaved roads, yards, open stock piles, and similar activities.
- Removal of particulate matter from roads and other paved areas under the control of the permittee of the facility to prevent reentrainment, and from buildings or work areas to prevent particulate from becoming airborne.
- Landscaping or planting of vegetation.
- Use of hoods, fans, filters, and similar equipment to contain, capture, and/or vent particulate matter.
- Confining abrasive blasting where possible.
- Enclosure or covering of conveyor systems.
- Substitution of powdery materials with granular or pelletized materials, where possible.

[Rule 62-296.320(4)(c) F.A.C.]

3.0 Operation Requirements

3.1 Circumvention: No person shall circumvent any air pollution control device, or allow the emission of air pollutants without the applicable air pollution control device operating properly.
[Rule 62-210.650 F.A.C.]

4.0 Compliance Testing Requirements

4.1 Test Notification: Unless otherwise specified in this permit, the DERM Air Facilities Section shall be notified in writing of expected compliance test dates (when required) at least fifteen (15) days prior to compliance testing. The notification shall include the following information: the date, time, and location of each test, and the test contact person who will be responsible for coordinating and having such test conducted for the owner.
[Rule 62-297.310(7)(a) 9 F.A.C.]

4.2 Testing at Capacity: Compliance testing (when required) shall be conducted with the emission units operating at the permitted capacity (90 to 100% of the maximum permitted operation rate of the emission units). If an emission unit is not tested at permitted capacity, the emission unit shall not be operated above 110% of the test load until a new test showing compliance is conducted. Operation of the emissions unit above 110% of the test load is allowed for no more than 15 days for the purpose of conducting additional compliance testing to regain the authority to operate at the permitted capacity.
[Rule 62-297.310(2) F.A.C.]

4.3 Special Compliance Tests: When the DERM, after investigation, has good reason (such as complaints, increased visible emissions or questionable maintenance of control equipment) to believe that any applicable emission standard in Rules 62-204 through 62-297 or in a permit issued pursuant to those rules is being violated, it shall require the permittee of the emissions unit to conduct compliance tests which identify the nature and quantity of pollutant emissions from the emissions unit and to provide a report on the results of said tests to the DERM.
[Rule 62-297.310(7)(b) F.A.C.]

5.0 Reporting and Record Keeping Requirements

5.1 Report Excess Emissions: In case of excess emissions resulting from malfunctions, each permittee shall notify the DERM in accordance with Rule 62-4.130, F.A.C. (condition 5.2 below). A full written report on the malfunctions shall be submitted in a quarterly report, if requested by the DERM.
[Rule 62-210.700(6) F.A.C.]

5.2 Report Plant Operation Problems: If the permittee is temporarily unable to comply with any of the conditions of the permit due to breakdown of equipment or destruction by hazard of fire, wind or by other cause, the permittee shall immediately notify the DERM. Notification shall include pertinent information as to the cause of the problem, and what steps are being taken to correct the problem and to prevent its recurrence, and where applicable, the owner's intent toward reconstruction of destroyed facilities. Such

notification does not release the permittee from any liability for failure to comply with the FDEP and the DERM rules.
[Rule 62-4.130 F.A.C.]

5.3 Retain Records: All records required by this permit shall be kept by the permittee and made available for the DERM inspection for a minimum of three (3) years from the date of such records.
[Rule 62-4.160(14)(b) F.A.C.]

5.4 Compliance Test Reports: Compliance test reports (when required) shall be submitted to the DERM Air Facilities Section, as soon as practical, but no later than 45 days after the last sampling run of each test is completed.
[Rule 62-297.310(8)(a) &(b) F.A.C.]

Test reports shall provide sufficient detail on the emissions unit tested and the test procedures used to allow the DERM to determine if the test was properly conducted and the test results properly computed. Test reports, other than for an EPA Method 9 test, shall include the following information and other information as necessary to make a complete report required pursuant to F.A.C. Rule 297.310(8)(c):

- The normal type and amount of fuels used and materials processed, and the types and amounts of fuels used and material processed during each test run.
- The means, raw data and computations used to determine the amount of fuels used and materials processed, if necessary to determine compliance with an applicable emission limiting standard.
- The type of air pollution control devices installed on the emissions unit, their general condition, their normal operating parameters (pressure drops, total operating current and GPM scrubber water), and their operating parameters during each test run.
- All measured and calculated data required to be determined by each applicable test procedure for each run.
- The detailed calculations for one run that relate the collected data to the calculated emission rate.
- The applicable emission standard, and the resulting maximum allowable emission rate for the emissions unit, plus the test result in the same form and unit of measure.

5.5 Annual Report Required: On or before March 1 of each calendar year, a completed DEP Form 62-210.900(5), Annual Operating Report (AOR) Form for Air Pollutant Emitting Facility, shall be submitted to the Miami-Dade County DERM, Air Facilities Section. Included with this report shall be any additional reports, if any, required by this permit in Part III -- Emission Unit Specific Conditions.
[Rule 62-210.370(3) F.A.C.]

PART III – EMISSION UNIT SPECIFIC CONDITIONS

This part of this permit addresses the following emission units:

Emissions Unit Number	Emissions Unit Description
026	Concrete Block Plant with a design capacity of 5,500 blocks per hour (approximately 96 tons per hour of concrete block). The block plant consists of three (3) Aggregate Storage Silos with Weigh Hoppers, and two (2) Cement Storage Silos. Each Cement Storage Silo has 2 Baghouses, a Mixer, and a Weigh Hopper with Baghouse. A total of 6 baghouses are associated with the Concrete Block Plant. See table below for baghouse design specifications.

Concrete Block Plant Baghouse Design Specifications

Source ID	Manufacturer	Model No.	Number of Cartridges	Flow Rate (acfm)	Cloth Area (ft^2)	Air to Cloth Ratio
Cement Silo #1	C & W Mfg.	CP-310 [2 units]	4	1600	304	5.3
Cement Silo #2	C & W Mfg.	CP-310 [2 units]	4	1600	304	5.3
Weigh Hopper #1	C & W Mfg.	CP-100 [1 unit]	1	400	110	4.0
Weigh Hopper #2	C & W Mfg.	CP-100 [1 unit]	1	400	110	4.0

.0 Essential Potential to Emit (PTE) Parameters

1.1 Hours of Operation: The Concrete Block Plant may not operate in excess of 20 hours/day, 6 days/week for 52 weeks/year resulting in a total of 6,240 hrs/year.
[Rule 62-4.070(3) F.A.C.; Requested by Permittee in Application received July 1, 2002]

1.2 Visible Emissions: Emissions from silos, weigh hoppers (batchers), and other enclosed storage and conveying equipment shall be controlled to the extent necessary to limit visible emissions to 5 percent opacity.
[Rule 62-296.414(1), F.A.C.]

2.0 Testing and Recordkeeping Requirements

2.1 Unconfined Emissions: The permittee shall take reasonable precautions to control unconfined emissions from hoppers, storage and conveying equipment, conveyor drop points, truck loading and unloading, roads, parking areas, stock piles, and yards as required by Rule 62-296.320(4)(c), F.A.C. and Facility-Wide Specific Condition No. 2.4 of this permit. The following shall constitute additional reasonable precautions for the concrete block plant:

- Reduction of stock pile height or installation of wind breaks to mitigate wind entrainment of particulate matter from stock piles.
- Use of spray bar, chute, or partial enclosure to mitigate emissions at the drop point to the truck.

[Rule 62-296.414(2), F.A.C.]

2.2 Test Methods & Procedures: All emissions tests performed shall comply with the following requirements.
(a) The test method for visible emissions shall be EPA Method 9.
(b) Test procedures shall meet all applicable requirements of Chapter 62-297, F.A.C.
(c) Visible emissions tests of silo dust collector exhaust points shall be conducted while loading the silo at a rate that is representative of the normal silo loading rate. The minimum loading rate shall be 25 tons per hour unless such rate is unachievable in practice. If emissions from the weigh hopper

(batcher) operation are also controlled by the silo dust collector, then the batching operation shall be in operation during the visible emissions test. The batching rate during the emissions test shall be representative of the normal batching rate and duration. Each test report shall state the actual silo loading rate during emissions testing and, if applicable, whether or not batching occurred during emissions testing.

(d) If emissions from the weigh hopper (batcher) operation are controlled by a dust collector which is separate from the silo dust collector, visible emissions tests of the weigh hopper (batcher) dust collector exhaust point shall be conducted while batching at a rate that is representative of the normal batching rate and duration. Each test report shall state the actual batching rate during emissions testing.

(e) Each dust collector exhaust point shall be tested for a minimum of 30 minutes or, if the operation is normally completed within less than 30 minutes and does not recur within that time, the test shall last for the length of the loading operation.

[Rule 62-296.414(3), and 62-297.310(4)(a), F.A.C.]

2.3 Annual Testing: Each dust collector exhaust point shall be tested annually for compliance with the visible emission limiting standard of Rule 62-296.414(1), F.A.C.
[Rule 62-296.414(4), F.A.C.]

2.5 Record of Operating Hours: The permittee shall keep a daily log of the number of hours of operation.
[Rule 62-4.070(3) F.A.C.]

Executed in Miami-Dade County, Florida.

DEPARTMENT OF ENVIRONMENTAL
RESOURCES MANAGEMENT

H. Patrick Wong 9/20/02

H. Patrick Wong, Chief — Date
Air Quality Management Division

HPW/cj

Copy: Scott Sheplak, Florida Department of Environmental Protection (FDEP), Tallahassee
Tom Tittle, FDEP Air Program, Southeast District Office
Scott Quaas, Tarmac

FILING AND ACKNOWLEDGMENT: FILED, on this date, pursuant to § 120.52(7), F.S., with the designated DERM Clerk, receipt of which is hereby acknowledged.

M Marrio — 9/20/02

Clerk — Date

APPENDIX A
GENERAL PERMIT CONDITIONS

1. The terms, conditions, requirements, limitations, and restrictions set forth in this permit are "Permit Conditions" and are binding and enforceable pursuant to Sections 403.161, 403.727, or 403.859 through 403.861, Florida Statutes. The permittee is placed on notice that the DERM will review this permit periodically and may initiate enforcement action for any violation of these conditions.

2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings or exhibits, specifications, or conditions of this permit may constitute grounds for revocation and enforcement action by the DERM.

3. As provided in Subsections 403.087(6) and 403.722(5), Florida Statutes, the issuance of this permit does not convey and vested rights or any exclusive privileges. Neither does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations. This permit is not a waiver or approval of any other DERM permit that may be required for other aspects of the total project which are not addressed in the permit.

4. This permit conveys no title to land or water, does not constitute State recognition or acknowledgment of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title.

5. This permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, or plant life, or property caused by the construction or operation of this permitted source, or from penalties therefore; nor does it allow the permittee to cause pollution in contravention of Florida Statutes and DERM rules, unless specifically authorized by an order from the DERM.

6. The permittee shall properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this permit, as required by DERM rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the permit and when required by DERM rules.

7. The permittee, by accepting this permit, specifically agrees to allow authorized DERM personnel, upon presentation of credentials or other documents as may be required by law and at a reasonable time, access to the premises, where the permitted activity is located or conducted to:

   (a) Have access to and copy and records that must be kept under the conditions of the permit;
   (b) Inspect the facility, equipment, practices, or operations regulated or required under this permit, and,
   (c) Sample or monitor any substances or parameters at any location reasonably necessary to assure compliance with this permit or DERM rules.

   Reasonable time may depend on the nature of the concern being investigated.

8. If, for any reason, the permittee does not comply with or will be unable to comply with any condition or limitation specified in this permit, the permittee shall immediately provide the DERM with the following information:

   (a) A description of and cause of non-compliance; and
   (b) The period of noncompliance, including dates and times; or, if not corrected, the anticipated time the non-compliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the non-compliance.

The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the DERM for penalties or for revocation of this permit.

9. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source which are submitted to the DERM may be used by the DERM as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or DERM rules, except where such use is prescribed by Sections 403.73 and 403.111, Florida Statutes. Such evidence shall only be used to the extend it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

10. The permittee agrees to comply with changes in DERM rules and Florida Statutes after a reasonable time for compliance, provided, however, the permittee does not waive any other rights granted by Florida Statutes or DERM rules.

11. This permit is transferable only upon DERM approval in accordance with Florida Administrative Code Rules 62-4.120 and 62-730.300, F.A.C., as applicable. The permittee shall be liable for any non-compliance of the permitted activity until the transfer is approved by the DERM.

12. This permit or a copy thereof shall be kept at the work site of the permitted activity.

13. The permittee shall comply with the following:

    (a) Upon request, the permittee shall furnish all records and plans required under DERM rules. During enforcement actions, the retention period for all records will be extended automatically unless otherwise stipulated by the DERM.

    (b) The permittee shall hold at the facility or other location designated by this permit records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation) required by the permit, copies of all reports required by this permit, and records of all data used to complete the application or this permit. These materials shall be retained at least three years from the date of the sample, measurement, report, or application unless otherwise specified by DERM rule.

    (c) Records of monitoring information shall include:

        1. The date, exact place, and time of sampling or measurements;
        2. The person responsible for performing the sampling or measurements;
        3. The dates analyses were performed;
        4. The person responsible for performing the analyses;
        5. The analytical techniques or methods used; and
        6. The results of such analyses.

14. When requested by the DERM, the permittee shall within a reasonable time furnish any information required by law which is needed to determine compliance with the permit. If the permittee becomes aware that relevant facts were not submitted or were incorrect in the permit application or in any report to the DERM, such facts or information shall be corrected promptly.

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

☐ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

☒ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

☒ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

☐ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
Ready Mix Plant

3. Emissions Unit Identification Number: **025**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A			**32**	☐ Yes ☒ No

9. Package Unit:
Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
Ready-mix concrete plant produces 130 cubic yards per hour (yards/hr) [244 tons per hour (TPH)] of concrete with emissions from cement/fly ash storage silos & weigh hopper controlled by baghouses.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

   Baghouses (7)

2. Control Device or Method Code(s): **018**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	**130 cubic yards/hr**
2. Maximum Production Rate:	
3. Maximum Heat Input Rate:	million Btu/hr
4. Maximum Incineration Rate:	pounds/hr tons/day
5. Requested Maximum Operating Schedule:	
	24 hours/day — **8** days/week
	52 weeks/year — **8,760** hours/year
6. Operating Capacity/Schedule Comment:	
Maximum production capacity rated at 130 cubic yards/hr (± 244 TPH) of concrete.	

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 025**		2. Emission Point Type Code: **3**
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **4 baghouses. See Attachment TM-EU8-C15.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **H**	6. Stack Height: **50** feet	7. Exit Diameter: **1.2** feet
8. Exit Temperature: **77** °F	9. Actual Volumetric Flow Rate: **3,000** acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm		12. Nonstack Emission Point Height: feet
13. Emission Point UTM Coordinates... Zone: **17** East (km): **563.1** North (km): **2,861.9**		14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)
15. Emission Point Comment: **Stack parameters are for the Cement/Fly Ash Silo No. 1 baghouse. See Attachment TM-EU8-C15 for stack parameters of other baghouses.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 1

1. Segment Description (Process/Fuel Type): **Mineral Products; Concrete Batching; General: Non-fugitive.**		
2. Source Classification Code (SCC): **3-05-011-01**	3. SCC Units: **Cubic Yards of Concrete**	
4. Maximum Hourly Rate: **130**	5. Maximum Annual Rate: **1,138,800**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment:		

Segment Description and Rate: Segment _____ of _____

1. Segment Description (Process/Fuel Type):		
2. Source Classification Code (SCC):	3. SCC Units:	
4. Maximum Hourly Rate:	5. Maximum Annual Rate:	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment:		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	018		NS
PM_{10}	018		NS

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.87** lb/hour **0.91** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Baghouse efficiency of 99%** Reference: **AP-40, AP-42, and BEP**	7. Emissions Method Code: **3**
8. Calculation of Emissions:	
9. Pollutant Potential/Estimated Fugitive Emissions Comment: **See Attachment TM-EU8-F1.8. Emissions represent baghouse emissions only.**	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: **0.55** lb/hour **0.58** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: **Baghouse efficiency of 99 percent** Reference: **AP-40, AP-42, and BEP**	7. Emissions Method Code: **3**
8. Calculation of Emissions:	
9. Pollutant Potential/Estimated Fugitive Emissions Comment: **See Attachment TM-EU8-F1.8. Emissions represent baghouse emissions only.**	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 1

1. Visible Emissions Subtype: **VE05**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **5** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **Rule 62-296.414, F.A.C.**	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU8-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU8-C15** ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

EMISSIONS UNIT INFORMATION
Section [8]
Ready Mix Plant

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e)) ☐ Attached, Document ID: _____ ☐ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.) ☐ Attached, Document ID: _____ ☐ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only) ☐ Attached, Document ID: _____ ☐ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements ☒ Attached, Document ID: **TM-EU8-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading) ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application ☐ Certificate of Representation (EPA Form No. 7610-1) ☐ Copy Attached, Document ID: _____ ☐ Acid Rain Part (Form No. 62-210.900(1)(a)) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.) ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date: _____ ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU8-C15

DETAILED DESCRIPTION OF CONTROL EQUIPMENT

ATTACHMENT TM-EU8-C15
CONTROL EQUIPMENT INFORMATION FOR READY-MIX PLANT

Source ID	Manufacturer	Model No.	No. of Bags	Flow Rate (acfm)	Cloth Area (ft2)	Cloth Ratio
Cement/Flyash Silo No. 1	C&W Manufacturing	CP-310	6	1600	267	6.0
Cement/Flyash Silo No. 2	C&W Manufacturing	CP-310	8	1600	304	5.3
Cement/Flyash Silo No. 3	C&W Manufacturing	CP-310(2)	6	1600	267	6.0
Cement/Flyash Silo No. 4	C&W Manufacturing	CP-340	6	1800	267	6.7
Weigh/Loadout No.1	C&W Manufacturing	KR-1100	12	6500	912	7.1
Weigh/Loadout No.2	Vince Hagen	VH-1083-JP	99	6500	1083	6.0

ATTACHMENT TM-EU8-F1.8

EMISSION CALCULATIONS

ATTACHMENT TM-EU8-F1.8
POTENTIAL EMISSIONS FROM THE READY MIX PLANT (EU ID NO. 025)

Emission Unit	Equipment ID	Operating Hours (hr/yr)	Emission Factor [a] PM	Emission Factor [a] PM_{10}	Activity Factor	Control Efficiency [b] (%)	Potential PM Emission Rate lb/hr	Potential PM Emission Rate TPY	Potential PM_{10} Emission Rate lb/hr	Potential PM_{10} Emission Rate TPY
				24-Hour						
Cement/Flyash Silo No. 1	CP-310	8760	0.72	0.46 lb/ton material	30 TPH	99	0.22	--	0.14	--
Cement/Flyash Silo No. 2	CP-310	8760	0.72	0.46 lb/ton material	30 TPH	99	0.22	--	0.14	--
Cement/Flyash Silo No. 3	CP-310 (2)	8760	0.72	0.46 lb/ton material	30 TPH	99	0.22	--	0.14	--
Cement/Flyash Silo No. 4	CP-340	8760	0.72	0.46 lb/ton material	30 TPH	99	0.22	--	0.14	--
Weigh Hopper No. 1	KR-1100	8760	0.0051	0.0024 lb/ton material	28.6 TPH	99	0.0015	--	0.0007	--
Weigh Hopper No. 2	VH-1083-JP	8760	0.0051	0.0024 lb/ton material	28.6 TPH	99	0.0015	--	0.0007	--
						Total=	0.87		0.55	
				Annual Average						
Cement/Flyash Silo No. 1	CP-310	8760	0.72	0.46 lb/ton material	62,634 TPY	99	--	0.23	--	0.14
Cement/Flyash Silo No. 2	CP-310	8760	0.72	0.46 lb/ton material	62,634 TPY	99	--	0.23	--	0.14
Cement/Flyash Silo No. 3	CP-310 (2)	8760	0.72	0.46 lb/ton material	62,634 TPY	99	--	0.23	--	0.14
Cement/Flyash Silo No. 4	CP-340	8760	0.72	0.46 lb/ton material	62,634 TPY	99	--	0.23	--	0.14
Weigh Hopper No. 1	KR-1100	8760	0.0051	0.0024 lb/ton material	125,268 TPY	99	--	0.0032	--	0.0015
Weigh Hopper No. 2	VH-1083-JP	8760	0.0051	0.0024 lb/ton material	125,268 TPY	99	--	0.0032	--	0.0015
							Total =	0.91		0.58

TPH = tons per hour

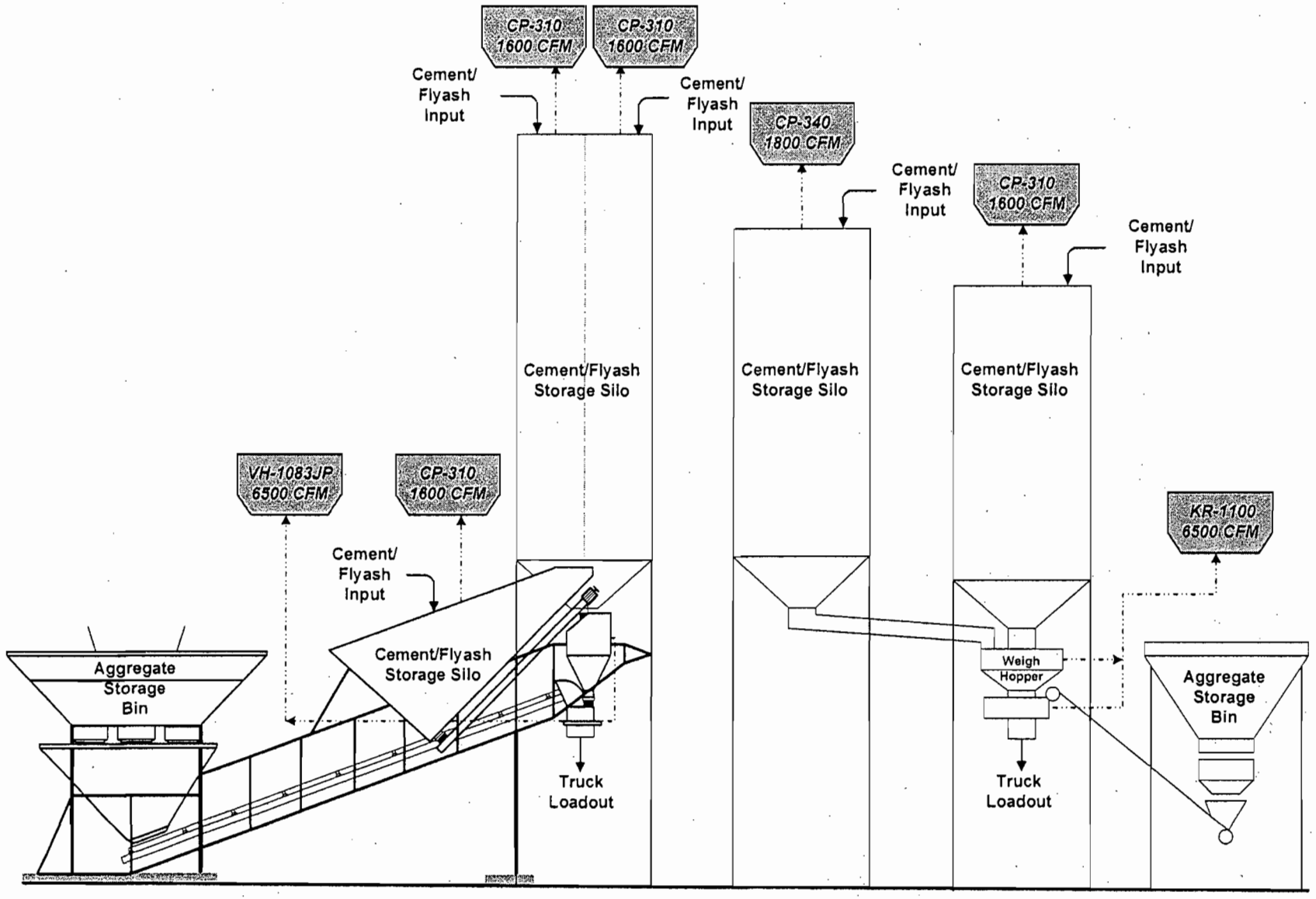
TPY = tons per year

[a] Factors taken from Table 11.12-2 of AP-42, Section 11.12, Concrete Batching, EPA, October 2001.

[b] Based on baghouse efficiency of 99% (AP-40, AP-42 & BEP).

ATTACHMENT TM-EU8-I1

PROCESS FLOW DIAGRAM



Ready-Mix Plant [EU-025]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND	TITAN AMERICA
Attachment TM-EU8-I1 Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 1/31/2006	Air Flow Solid Matter	

ATTACHMENT TM-EU8-IV1

LIST OF APPLICABLE REGULATIONS

ATTACHMENT TM-EU8-IV1

LIST OF APPLICABLE REGULATIONS FOR THE READY MIX CONCRETE PLANT

62-296.320(3) – Reasonable Precautions to Prevent Fugitive Emissions

62-296.414, F.A.C. – Batch Plant Visible Emissions Standards

Florida Department of Environmental Regulation

Southeast District • 1900 S. Congress Ave., Suite A • West Palm Beach, Florida 33406 • 407-964-9668

Bob Martinez, Governor | Dale Twachtmann, Secretary | John Shearer, Assistant Secretary | Scott Benyon, Deputy Assistant Secretary

PERMITTEE:
Mr. Rand G. Eachus
Vice President
Standard Conrete Corporation
7855 N.W. 12th Street, Suite 105
Miami, Florida 33126

I.D. NUMBER: 50/DAD/13/0519
PERMIT/CERTIFICATION NUMBER: AC 13-158138
DATE OF ISSUE: MAY 16 1989
EXPIRATION DATE: February 28, 1990
COUNTY: Dade
LATITUDE/LONGITUDE: 25°52'32"N/80°22'13"W
UTM: Zone 17; 563.09Km. E; 2861.93Km. N
PROJECT: Standard Concrete Corporation
Concrete Batch Plant No. 4

This permit is issued under the provisions of Chapter 403, Florida Statutes, and Florida Administrative Code Rule 17-2, and in conformance with all existing regulations of the Florida Department of Environmental Regulation. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

CONSTRUCT: An air pollution source consisting of a 130 cu.yd./hr. (243.75 tons/hr.) ready-mix concrete batch plant. The facility has two cement storage silos with emissions controlled by a Standley DCS-16 ground mounted dust collector at a generalized height of 20 feet above ground level. The weigh hopper's emissions are controlled by a separate dust collector.

IN ACCORDANCE WITH: Application to Construct Air Pollution Sources received December 8, 1988 and Notice of Intent issued May 1, 1989 and published May 4, 1989 in The Miami Herald (none are attached).

LOCATED AT: The Southeast Corner of N.W. 121st Way and N. W. 107th Avenue, Medley, Dade County, Florida.

TO SERVE: A concrete ready-mix plant (SIC # 3271).

SUBJECT TO: General Conditions 1-17(d). and Specific Conditions 1-9.

Mr. Rand G. Eachus, Vice P...s.
Standard Concrete Corp.
Miami, Florida

PERMIT/CERTIFIC ION NUMBER: AC 13-158138
DATE OF ISSUE: MAY 18 1989
EXPIRATION DATE: February 28, 1990

SPECIFIC CONDITIONS:

1. Application for a permit to operate shall be submitted to the Department at least sixty (60) days prior to the expiration of this permit, but in no case more than fourteen (14) days after commencement of operation. In no case shall a source be operated without an appropriate operating permit. The Certification of Completion of Construction, DER Form 17-1.202(3) may be submitted in lieu of the application for a permit to operate.

2. Emission limiting standard is as follows:

   In accordance with Florida Administration Code Rule 17-2.610(2) - no person shall let, permit, suffer, or allow to be discharged into the atmosphere any pollutants from new, or existing sources, the density of which is equal to or greater than 20% opacity.

   NOTE: Visible emissions greater than 5% opacity may indicate circumvention or a malfunction and should be investigated promptly.

3. The compliance test report shall include results of tests by the following method:

Source/Emission Point	Pollutant	Test Method
Silo Baghouse	Visible Emissions	EPA Method 9

The compliance test report shall be submitted to the Department in accordance with Florida Administrative Code (F.A.C.) Rule 17-2.700(7).

4. Testing of emissions should be conducted using the fuel and/or process input which are expected to result in the highest emissions and within ten percent (10%) of the rated capacity of the source, otherwise the Department may require the test to be repeated or require modification of the permit to reflect tested rates and/or fuels.

5. The Department shall be notified of expected test dates at least fifteen (15) days prior to compliance testing.

6. On or before March 1 of each calendar year, a completed DER Form 17-1.202(6), Annual Operations Report Form for Air Emissions Sources shall be submitted to the Department.

7. Copies of all reports, tests, notifications or other submittals required by this permit shall be submitted to both the Department of Environmental Regulation, Southeast District Office and Dade County Environmental Resources Management.

8. Unconfined emissions of particulate shall be controlled by the following means:
   a. Paved parking and trafficked areas shall be maintained and kept free of particulate matter build-up.
   b. Sprinkling with water shall be used as necessary on paved areas and stockpiles.
   c. Facility site shall be kept free of waste concrete from the washout pit or other sources.

9. The permittee shall be aware of and operate under the attached "General Permit Conditions #1 thru #9". General Permit Conditions are binding upon the permittee and enforceable pursuant to Chapter 403 of the Florida Statutes.

Issued this 18th day of May, 1989

STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL REGULATION

J. Scott Benyon
Deputy Assistant Secretary

DER Form 17-1.201(5)
Effective November 30, 1982

Department of Environmental Protection

Lawton Chiles
Governor

Southeast District
P.O. Box 15425
West Palm Beach, Florida 33416

Virginia B. Wetherell
Secretary

PERMITTEE:
Mr. Scott Quaas, Env. Manager
Tarmac America, Inc.
455 Fairway Drive
Deerfield Beach, FL 33441

PERMIT/CERTIFICATION NUMBER: 0250519-001-AO
DATE OF ISSUE: NOV 0 2 1995
EXPIRATION DATE: NOV 0 2 2000
COUNTY: Dade
LATITUDE/LONGITUDE: 25°52'32"N/80°22'13"W
UTM: Zone 17; 563.10 Km. E; 2861.9 Km. N
PROJECT: Tarmac America, Inc.
Pennsuco Batch Plant

This permit is issued under the provisions of Chapter 403, Florida Statutes, and Florida Administrative Code Rules 62-210, 296 and 297, and in conformance with all existing regulations of the Florida Department of Environmental Protection. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

OPERATE/MODIFY: An Air Pollution Source consisting of a 130 cubic yard/hour ready mix concrete batch plant. Modification includes installation of an additional storage silo and replacement of the existing cement/fly ash storage silo baghouses with a centralized baghouse to control emissions from all storage silos.

IN ACCORDANCE WITH: Application to modify received September 25, 1995, and Application to Operate Air Pollution Sources received April 8, 1993; Permit to Construct was issued May 18, 1989, and on June 14, 1990, it was extended from February 28, 1990 to September 1, 1990; Application to Construct Air Pollution Sources received December 8, 1988 and Notice of Intent issued May 1, 1989, and published May 4, 1989 in the Miami Herald (none are attached).

LOCATED AT: 11955 N.W. 102 Rd., Medley, Dade County, Florida.

TO SERVE: A concrete ready mix batch plant (SIC #3271).

SUBJECT TO: General Conditions 1-14 and Specific Conditions 1- 4.

*This permit supersedes permit number AO 13-229268 issued September 1, 1993

GENERAL CONDITIONS:

1. The terms, conditions, requirements, limitations, and restrictions set forth in this permit, are "permit conditions" and are binding and enforceable pursuant to Sections 403.141, 403.727, or 403.859 through 403.861, F.S. The permittee is placed on notice that the Department will review this permit periodically and may initiate enforcement action for any violation of these conditions.

2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this permit may constitute grounds for revocation and enforcement action by the Department.

3. As provided in subsections 403.087(6) and 403.722(5), F.S., the issuance of this permit does not convey any vested rights or any exclusive privileges. Neither does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state, or local laws or regulations. This permit is not a waiver of or approval of any other Department permit that may be required for other aspects of the total project which are not addressed in the permit.

4. This permit conveys no title to land or water, does not constitute State recognition or acknowledgement of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title.

5. This permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, or plant life, or property caused by the construction or operation of this permitted source, or from penalties therefore; nor does it allow the permittee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department.

The permittee shall properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this permit, as required by Department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the permit and when required by Department rules.

7. The permittee, by accepting this permit, specifically agrees to allow authorized Department personnel, upon presentation of credentials or other documents as may be required by law and at reasonable times, access to the premises where the permitted activity is located or conducted to:

(a) Have access to and copy any records that must be kept under the conditions of the permit;

(b) Inspect the facility, equipment, practices, or operations regulated or required under this permit; and

(c) Sample or monitor any substances or parameters at any location reasonably necessary to assure compliance with this permit or Department rules. Reasonable time may depend on the nature of the concern being investigated.

8. If, for any reason, the permittee does not comply with or will be unable to comply with any condition or limitation specified in the permit, the permittee shall immediately notify and provide the Department with the following information:

(a) A description of and cause of noncompliance; and

GENERAL CONDITIONS:

(b) The period of noncompliance, including exact dates and times; or, if not corrected, the anticipated time the noncompliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the noncompliance. The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the Department for penalties or for revocation of this permit.

9. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source which are submitted to the Department, may be used by the Department as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or Department rules, except where such use is prescribed by Sections 403.111 and 403.73, F.S. Such evidence shall only be used to the extent it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

10. The permittee agrees to comply with changes in Department rules and Florida Statutes after a reasonable time for compliance; provided, however, the permittee does not waive any other rights granted by Florida Statutes or Department rules.

11. This permit is transferable only upon Department approval in accordance with Rule 62-4.120 and 62-30.300, F.A.C., as applicable. The permittee shall be liable for any noncompliance of the permitted activity until the transfer is approved by the Department.

12. This permit or a copy thereof shall be kept at the work site of the permitted activity.

13. The permittee shall comply with the following :

(a) Upon request, the permittee shall furnish all records and plans required under Department rules. During enforcement actions, the retention period for all records will be extended automatically, unless otherwise stipulated by the Department.

(b) The permittee shall hold at the facility or other location designated by this permit, records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation) required by the permit, copies of all reports required by this permit, and records of all data used to complete the application for this permit. These materials shall be retained at least three years from the date of the sample, measurement, report or application unless otherwise specified by Department rule.

(c) Records of monitoring information shall include:

- the date, exact place, and time of sampling or measurements;
- the person responsible for performing the sampling or measurements;
- the date(s) analyses were performed;
- the person responsible for performing the analyses;
- the analytical techniques or methods used; and
- the results of such analyses.

14. When requested by the Department, the permittee shall within a reasonable time furnish any information required by law which is needed to determine compliance with the permit. If the permittee becomes aware the relevant facts were not submitted or were incorrect in the permit application or in any report to the Department, such facts or information shall be submitted or corrected promptly.

SPECIFIC CONDITIONS:

In this permit, references to FAC Rule 62-4, 62-210, 296 and 297 refer to rules promulgated under Title 62 of the Florida Administrative Code; references (if any) to 40 CFR 60 refer to regulations codified under Title 40 of the Code of Federal Regulations.

Renewal of This Permit is Required

1. An application for an operating permit must be submitted to the Department of Environmental Protection, Southeast District Office, Air Program, and the Dade County Department of Environmental Resources Management, Air Section at least 60 days prior to the expiration date of this permit. To apply for an operation permit, the applicant shall submit the appropriate application fee and, in quadruplicate, the appropriate application form, compliance test results, and such additional information as the Department may by law require. [FAC Rule 62-4.030, FAC Rule 62-4.050, and FAC Rule 62-4.220]

Emission Limiting Standards

2. The silo(s), hopper and other storage or conveying equipment shall be controlled to the extent necessary to limit visible emissions to 5 percent opacity. [Rule 62-296.414(1), F.A.C.]

The permittee shall not allow any person to circumvent any pollution control device nor allow the emissions of air pollutants without the applicable air pollution control device operating properly. [Rule 62-210.650, F.A.C.]

All reasonable precautions shall be taken to prevent emissions of unconfined particulate matter. Reasonable precautions shall include, but not be limited to, the following: [Rule 62-296.310(3), F.A.C.]

a. Paved parking and trafficked areas shall be maintained and kept free of particulate matter build-up.

b. Sprinkling with water shall be used as necessary on paved areas and stockpiles.

c. Facility site shall be kept free of waste concrete from the washout pit or other sources.

Reporting and Record Keeping Requirements

3. On or before March 1 of each calendar year, a completed DEP Form 622-210.900(5), Annual Operations Report Form for Air Pollutant Emitting Facility, shall be submitted to the Department of Environmental Protection, Southeast District Office, Air Program, and the Dade County Environmental Resources Management, Air Section.

All records required under this section shall be maintained by the owner or operator of the affected facility for a period of two years following the date of such record.

All reports, tests, notifications or other submittals required by this permit shall be submitted to both the Department of Environmental Protection, Southeast District Office, Air Program.

SPECIFIC CONDITIONS:

Compliance Testing Requirements

4. Each dust collector exhaust point shall be tested for visible emissions prior to permit renewal. [FAC Rule 62-297.340 (1)(d)].

Each dust collector exhaust point shall be tested by a certified observer in accordance with DEP Method 9 for a minimum of 30 minutes or, if the operation is normally completed within less than 30 minutes and does not recur within that time, the test shall last for the length of the silo loading operation. [Rule 62-297.330(1)(b)1., F.A.C.]

The compliance test report shall include results of tests by the following method:

Source/Emission Point	Pollutant	Test Method	Frequency
Silo Baghouse Outlet	Visible Emissions	DEP Method 9	In the Year Prior to Renewal

The compliance test report shall be submitted to the Department in accordance with Florida Administrative Code (F.A.C.) Rule 62-297.570.

The permittee shall conduct visible emissions testing while loading the silo at a rate that is representative of the normal silo loading rate. The normal silo loading rate shall be at least 25 TPH and occur in less than one hour. If the dust collector also collects dust from the batching operation, the batching operation shall be in operation during the visible emissions test. The batching rate during emissions testing shall be representative of the normal batching rate. Each test report shall state the actual silo loading rate during emissions testing and, if the dust collector controls the batching operation, state whether or not batching occurred during emissions testing. [Rule 62-4.070(3), F.A.C.]

The Department of Environmental Protection, Southeast District Office, Air Program and the Dade County Department of Environmental Resources Management, Air Section shall be notified in writing of expected compliance test dates at least fifteen (15) days prior to compliance testing. The notification must include the following information: the date, time, and location of each test; the name and telephone number of the facility's contact person who will be responsible for coordinating the test; and the name, company and telephone number of the person conducting the test. [FAC Rule 62-297.340(1)(i)]

Reports of the required compliance tests shall be filed with the Air Compliance Section of this Office as soon as practical but no later than 45 days after each test is completed. [Rule 62-297.570(2), F.A.C.]

The compliance test report shall include the following information on the air pollution control devices and other information as necessary to make a complete report: [FAC Rule 62-297.570(3)]

a. The normal type and amount of materials processed and the types and amounts of materials processed during each test run.

PERMITTEE:
Mr. Scott Quaas, Env. Manager
Tarmac America, Inc.

PERMIT/CERTIFICATION NUMBER: 0250519-001-AO
DATE OF ISSUE: NOV 0 2 1995
EXPIRATION DATE: NOV 0 2 2000

SPECIFIC CONDITIONS:

b. Type of air pollution control devices installed on the emissions unit, their general condition, normal operating parameters (e.g. flow rate, pressure drops, scrubber gpm, operating current) and the actual operating parameters for each test run, and indicate how each parameter was determined.

c. Notation of any deficiencies or problems with the air pollution control equipment which occur during testing.

Executed in West Palm Beach, Florida.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION

I. Goldman 11-1-95

I. Goldman
Air Program Administrator
Southeast District

Date

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☒ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☐ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Aggregate Plant

3. Emissions Unit Identification Number: **022, 023**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A			**14**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Aggregate Plant consists of seven crushers, a quarry, decks, surge bin, feed piles, screens, storage bins, various storage piles, and conveyor transfer parts. EU 022 is the portion of the Aggregate Plant subject to 40 CFR 60, Subpart OOO; EU 023 is the portion of the Aggregate Plant not subject to 40 CFR 60, Subpart OOO.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

Partially enclosed transfer points

Water spray at all screens except scalping screens

2. Control Device or Method Code(s): **054, 099**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **1,213,333 tons per month**	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate: million Btu/hr	
4. Maximum Incineration Rate: pounds/hr tons/day	
5. Requested Maximum Operating Schedule:	
24 hours/day	**8** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

Maximum throughput rate is limited to 14,560,000 tons in any consecutive 12-month period.

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram: **EU 022, 023**	2. Emission Point Type Code: **4**	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking: **See Attachment TM-EU9-C3 for a list of emission points comprising this emission unit.**		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code: **F**	6. Stack Height: feet	7. Exit Diameter: feet
8. Exit Temperature: **77** °F	9. Actual Volumetric Flow Rate: acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment: **See Attachment TM-EU9-C3.**		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Stone Quarrying/Processing: Primary crushing**		
2. Source Classification Code (SCC): **3-05-020-01**	3. SCC Units: **Tons raw material**	
4. Maximum Hourly Rate: **2,000**	5. Maximum Annual Rate: **14,560,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Maximum hourly throughput rate is for testing purposes only [Rule 297.310(2)(b), F.A.C.].**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Stone Quarrying/Processing Miscellaneous Operations: Screen/Convey/Handling**		
2. Source Classification Code (SCC): **3-05-020-06**	3. SCC Units: **Tons raw material**	
4. Maximum Hourly Rate: **2,000**	5. Maximum Annual Rate: **14,560,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Maximum hourly throughput rate is for testing purposes only [Rule 297.310(2)(b), F.A.C.].**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM	054	099	EL
PM_{10}	054	099	EL

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: lb/hour **35.4** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: Reference: **Permit 0250020-012-AC**	7. Emissions Method Code: **0**
8. Calculation of Emissions: **Permit Limit**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 1

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **35.4 TPY**	4. Equivalent Allowable Emissions: lb/hour **35.4** tons/year
5. Method of Compliance: **EPA Method 9 annually.**	
6. Allowable Emissions Comment (Description of Operating Method): **Permit No. AC13-234568 and 0250020-012-AC**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: lb/hour **14** tons/year	4. Synthetically Limited? ☒ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: Reference: **Permit 0250020-012-AC**	7. Emissions Method Code: **0**
8. Calculation of Emissions: **Permit Limit**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 1

1. Basis for Allowable Emissions Code: **OTHER**	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units: **14 TPY**	4. Equivalent Allowable Emissions: lb/hour **14** tons/year
5. Method of Compliance: **EPA Method 9 annually.**	
6. Allowable Emissions Comment (Description of Operating Method): **Permit No. AC13-234568 and 0250020-012-AC**	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 3

1. Visible Emissions Subtype: **VE20**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **20** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **Rule 62-296.320(4)(b)1, F.A.C. This limit is applicable to the quarry, decks, primary crusher, crusher Y-13, feed pile, and transfer points up to the feed pile.**	

Visible Emissions Limitation: Visible Emissions Limitation 2 of 3

1. Visible Emissions Subtype: **VE15**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **15** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **40 CFR 60.672(c). This limit is applicable to the secondary/tertiary crushers.**	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 3 of 3

1. Visible Emissions Subtype: **VE0**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **0** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **40 CFR 60.672(h)(1). This limit is applicable to the primary and secondary screens and transfer points that handle wet materials.**	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☒ Attached, Document ID: **TM-EU9-I1** ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☒ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☒ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU9-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☒ Attached, Document ID: **CAM Plan** ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☒ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☒ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☒ Not Applicable

Additional Requirements Comment

ATTACHMENT TM-EU9-C3

EMISSION POINTS AND VISIBLE EMISSION LIMITS

ATTACHMENT TM-EU9-C3
EMISSION POINTS AND RESPECTIVE VISIBLE EMISSION LIMITS

ID	Description	Size	Service	NSPS Source?	VE Limit	Basis for VE Limit	Production Line	Max Process Rate
Crusher Building 1								
Y10	Truck Dump Hopper	280 ton capacity	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Y11	Screen	168 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Y12	Screen	112 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Y13	Crusher	800 TPH	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	800 TPH
Y15	Belt Conveyor	72 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	4000 TPH
Transfer Tower #1								
Y30	Surge Bin	75 ton capacity	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Y31	Vibrating Feeder (TP Y31 to Y33)	2500 TPH	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	2500 TPH
Y32	Vibrating Feeder (TP Y32 to Y33)	2500 TPH	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	2500 TPH
Transfer Tower #2								
Y33	Belt Conveyor (TP Y33 to Y34)	54 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	4200 TPH
Y34	Belt Conveyor (TP Y34 to Y35)	54 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	4200 TPH
Transfer Tower #3								
Y35	Belt Conveyor (TP Y35 to Y36)	54 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	4200 TPH
Y36	Belt Conveyor (to Feed Storage Piles)	54 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	4200 TPH
Aggregate Plant Feed Storage Pile			Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Cement Plant Feed Pile		35,000 ton capacity	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Aggregate & Cement Plant Feed Storage Pile			Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	--
Y48	Belt Conveyor (TP Y48 to Y49)	48 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	2000 TPH
Y49	Belt Conveyor (TP Y49 to Y50/Y60)	48 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	2800 TPH
Y110	Belt Conveyor (TP Y110 to Y49)	48 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Primary Crushing/Screening	2000 TPH
Secondary Tower/Transfer Tower #5								
Y50	Screen (TP Y50 to Y51/Y500)	144 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1600 TPH
Y51	Crusher (TP Y51 to Y52)	600 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	600 TPH
Y52	Belt Conveyor (TP Y52 to Y53/Y55)	48 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	2000 TPH
Y60	Screen (TP Y60 to Y61/Y62/Y500)	144 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1600 TPH
Y61	Crusher (TP Y61 to Y62)	600 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	600 TPH
Y62	Belt Conveyor (TP Y62 to Y63/Y65)	48 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	2000 TPH
Tower #6 - Screening and Crushing								
Y53	Screen (TP Y53 to Y54/Y571/Y71A)	168 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
Y54	Crusher (TP Y54 to Y57)	400 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	400 TPH
Y55	Screen (TP Y55 to Y56/Y71/Y71A)	168 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
Y56	Crusher (TP Y56 to Y57)	500 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	500 TPH
Y57	Belt Conveyor (TP Y57 to Y58)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1200 TPH
Y58	Belt Conveyor (TP Y58 to Y52/C-1)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1200 TPH

ATTACHMENT TM-EU9-C3
EMISSION POINTS AND RESPECTIVE VISIBLE EMISSION LIMITS

ID	Description	Size	Service	NSPS Source?	VE Limit	Basis for VE Limit	Production Line	Max Process Rate
Y62A	Stick Conveyor (Y62A to Y62)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1000 TPH
Y63	Screen (TP Y63 to Y71/Y71A/SP 1)	168 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
Y64	Crusher (TP Y64 to Y67)	500 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	500 TPH
Y65	Screen (TP Y65 to Y71/Y71A/SP 1)	168 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
Y66	Crusher (TP Y66 to Y67)	400 TPH	Saturated	Y	15%	40 CFR 60.672(c)	Secondary/Tertiary Crushing/Screening	400 TPH
Y67	Belt Conveyor (TP Y67 to Y68)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1200 TPH
Y68	Belt Conveyor (TP Y68 to Y62/C-1)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1200 TPH
Y71	Belt Conveyor (TP Y71 to Y73/Y80)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1800 TPH
Y71A	Belt Conveyor (TP Y71A to Y73/Y80)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1800 TPH
C-1	Belt Conveyor (TP C-1 to C-2)	48 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-2	Belt Conveyor	48 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Tower #6A								
	Screens (TP to C-3/C-5/C-9)	192 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
C-3	Belt Conveyor (TP C-3 to C-4)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-4	Belt Conveyor (Recycle back to Y50/Y60)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-5	Belt Conveyor (TP C-5 to C-6/C-8)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-6	Belt Conveyor (TP C-6 to C-7)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-7	Belt Conveyor	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-8	Belt Conveyor (TP C-8 to Y71A)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
YC-8A	Belt Conveyor (to Reclaim Hopper)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-9	Belt Conveyor (TP C-9 to C-10)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-10	Belt Conveyor (TP C-10 to C-11)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
C-11	Belt Conveyor	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
	Screens (TP to C-3/C-5/C-9/SP 2)	192 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	750 TPH
Y500	Stick Conveyor (TP Y500 to Y501)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	1000 TPH
Y501	Radial Stacker (TP Y501 to Y502)	42 inches	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Secondary/Tertiary Crushing/Screening	1000 TPH
Y502	Elevated Conveyor	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	400 TPH
Transfer Tower #7								
Y73	Belt Conveyor (TP Y73 to Y74)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Y74	Radial Stacker	48 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Cement Plant Blend Pile		--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Secondary/Tertiary Crushing/Screening	--
Y76	Belt Conveyor (TP Y76 to Y78)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Y76.1	Belt Conveyor (TP Y76.1 to Y76)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
	Hoppers	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Secondary/Tertiary Crushing/Screening	--
Y77	Belt Conveyor (TP Y77 to Y79)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Y77.1	Belt Conveyor (TP Y77.1 to Y77)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Y78	Belt Conveyor (TP Y78 to Y79)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--
Y80	Belt Conveyor (TP Y80 to 80/80A/81)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Secondary/Tertiary Crushing/Screening	--

ATTACHMENT TM-EU9-C3
EMISSION POINTS AND RESPECTIVE VISIBLE EMISSION LIMITS

ID	Description	Size	Service	NSPS Source?	VE Limit	Basis for VE Limit	Production Line	Max Process Rate
Transfer Tower #9								
Y79	Belt Conveyor (TP Y79 to Y102/Y210A)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Transfer Tower #10								
Y102	Belt Conveyor	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Y210A	Belt Conveyor (TP Y210A to Y212W/Y212E)	30 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Transfer Tower #80, 80A, 80B								
80	Screen (TP 80 to 85/90A/95)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	750 TPH
80A	Screen (TP 80A to 84/89/95A)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	600 TPH
80B	Screen (80B to 95B/406/85/90A)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	750 TPH
81	Belt Conveyor (TP 81 to 80B)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
84	Belt Conveyor (TP 84 to 85/85A)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
85A	Belt Conveyor	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
85B	Belt Conveyor	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
89	Belt Conveyor (TP 89 to 90A)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
95	Belt Conveyor (TP 95 to 100)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
95A	Belt Conveyor (TP 95A to 100A)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
95B	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
GR 57 (Storage Pile)		--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Finishing Plant	--
Transfer Tower #100, 100A, 100B								
100	Screen (100 to 105/110/115/117)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	750 TPH
100A	Screen (TP 100A to 104/109/114/117)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	600 TPH
100B	Screen (100B to 101/105/110/117)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	750 TPH
101	Belt Conveyor (TP 101 to 115)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
104	Belt Conveyor (TP 104 to 105)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
109	Belt Conveyor (TP 109 to 109A)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
109A	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
114	Belt Conveyor (TP 114 to 115)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
GR 16 (Storage Pile)		--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Finishing Plant	--
85	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
85B	Belt Conveyor	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
90A	Belt Conveyor (TP 90A to 90B/90C)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
90B	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
90C	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
105	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
110	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
115	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
210	Belt Conveyor (TP 210 to 212E/212W)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--

ATTACHMENT TM-EU9-C3
EMISSION POINTS AND RESPECTIVE VISIBLE EMISSION LIMITS

ID	Description	Size	Service	NSPS Source?	VE Limit	Basis for VE Limit	Production Line	Max Process Rate
Product Storage Piles								
Pile "1/4", Basic 1 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Pile "3/8", Basic 2 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Pile "1/2", Basic 3 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Pile "3/4", Basic 4 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Pile "1", Basic 5 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Pile Ballast, Basic 7 (TP to Y210)		--	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Transfer Tower #210								
212E	Belt Conveyor (TP 212E to 215E)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
212W	Belt Conveyor	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
Transfer Tower #215								
215E	Screens (TP 215E to 220/385N/385S/410)	160 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	1000 TPH
215W	Screen (TP 215W to 220/385S/385N/410)	192 ft^2	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	1000 TPH
220	Belt Conveyor (TP 220 to 225)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	1000 TPH
385N	Belt Conveyor (TP 385N to 385)	30 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
385S	Belt Conveyor (TP 385S to 385)	30 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Finishing Plant	--
225	Five Position Turn Head (TP to 230)	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Load Out	--
230	Belt Conveyor (to Storage Bins)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
	Storage Bins	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Load Out	--
290	Belt Conveyor (TP 290 to 296)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
296	Belt Conveyor (TP 296 to 300)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
295	Belt Conveyor (TP 295 to 297)	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
297	Belt Conveyor	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
300	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
303	Belt Conveyor	42 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
385	Belt Conveyor	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
	Scalpings Pile	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Load Out	--
390	Belt Conveyor (TP 390 to 395)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
395	Shuttle (to Storage Bins)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Load Out	--
	Railcar Loading	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Load Out	--
	Truck Loading	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Load Out	--
Sand Plant								
340	Belt Conveyor (TP 340 to 355)	30 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
345	Belt Conveyor (TP 345 to 360)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
345A	Belt Conveyor (TP 345A to 360)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
350	Belt Conveyor (TP 350 to 370)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--

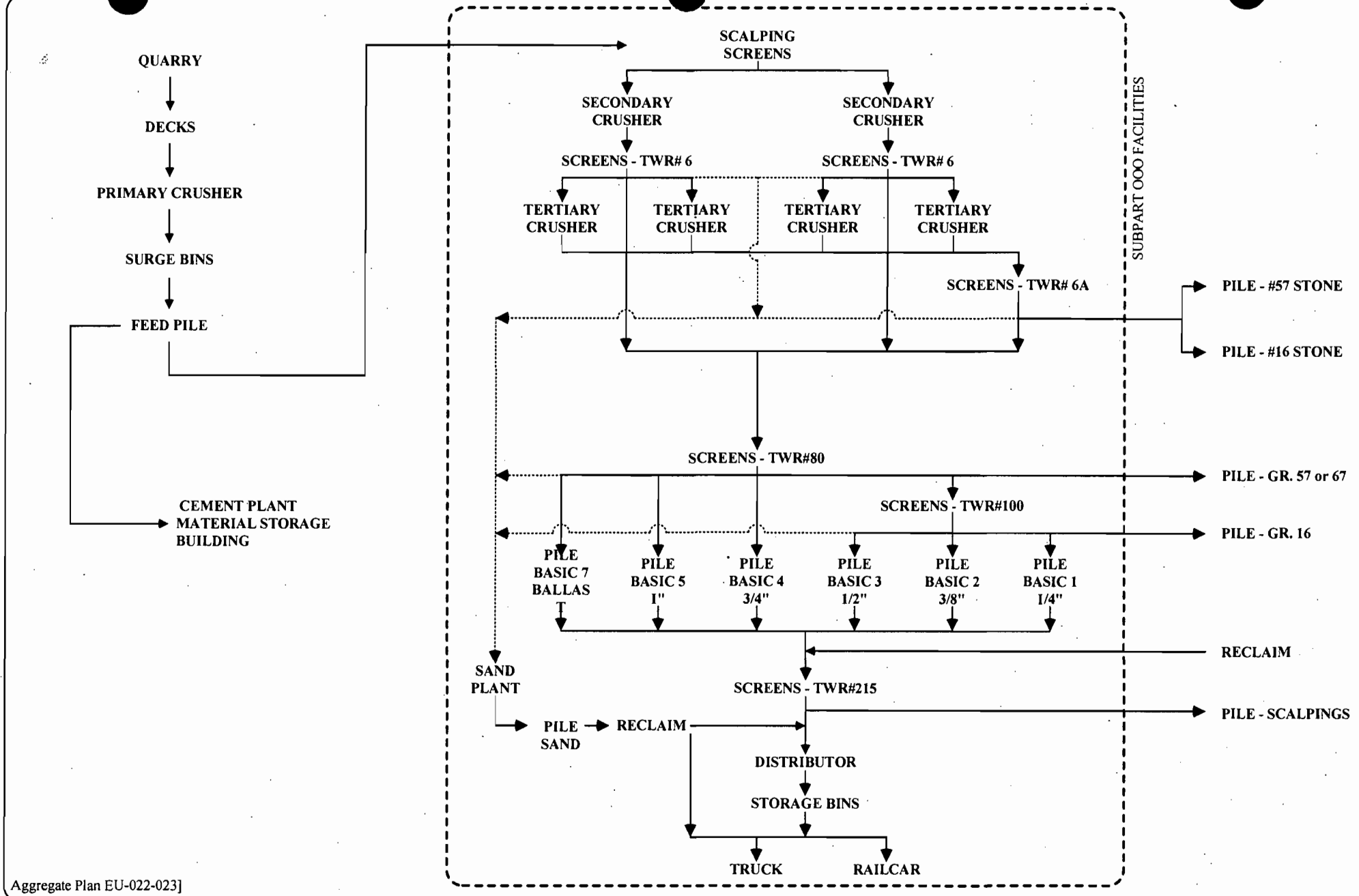
ATTACHMENT TM-EU9-C3
EMISSION POINTS AND RESPECTIVE VISIBLE EMISSION LIMITS

ID	Description	Size	Service	NSPS Source?	VE Limit	Basis for VE Limit	Production Line	Max Process Rate
355	Belt Conveyor (to Storage Piles)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
360	Belt Conveyor (to Storage Piles)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
370	Belt Conveyor (to Storage Piles)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
	Sand Storage Piles	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
390	Belt Conveyor (TP 390 to 395)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
	Sand Hopper	--	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
620	Screw Dehydrator (TP to 640)	228 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
625	Screw Dehydrator (TP to 645)	192.5 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
630	Screw Dehydrator (TP to 650)	228 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
635	Screw Dehydrator (TP to 655)	192.5 ft^2	Saturated	N	20%	Rule 62-296.320(4)(b)1., F.A.C.	Sand Plant	--
640	Belt Conveyor (TP 640 to 340/345/345A)	36 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
645	Belt Conveyor (TP 645 to 340/345/350)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
650	Belt Conveyor (TP 650 to 340/345/350)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--
655	Belt Conveyor (TP 655 to 340/345/350)	24 inches	Saturated	Y	0%	40 CFR 60.672(h)(1)	Sand Plant	--

Sources: Golder (2001) and Tarmac (1999).
TP = Transfer Point

ATTACHMENT TM-EU9-I1

PROCESS FLOW DIAGRAM



Aggregate Plan EU-022-023]

DESCRIPTION	TITLE: PENNSUCO CEMENT	LEGEND
Attachment TM-EU9-I1 Process Flow Diagram	FILENAME: 0537642/4.4/PlotPlans.vsd LAST REVISION DATE: 2/23/2006	Air Flow Solid Matter

TITAN AMERICA

ATTACHMENT TM-EU9-IV1

LIST OF APPLICABLE REGULATIONS

ATTACHMENT TM-EU9-IV1

LIST OF APPLICABLE REGULATIONS FOR THE AGGREGATE PLANT

40 CFR 60.670 – Applicability and Designation of Affected Facility

40 CFR 60.672(b) – Standard for Particulate Matter

40 CFR 60.672(c) – Standard for Particulate Matter

40 CFR 60.672(d) – Standard for Particulate Matter

40 CFR 60.675(a) – Test Methods and Procedures

40 CFR 60.675(c)(1) – Test Methods and Procedures

40 CFR 60.675(c)(3) – Test Methods and Procedures

40 CFR 60.675(c)(4) – Test Methods and Procedures

40 CFR 60.675(e) – Test Methods and Procedures

40 CFR 60.675(g) – Test Methods and Procedures

40 CFR 60.675(h) – Test Methods and Procedures

40 CFR 60.676(a) – Reporting and Recordkeeping

40 CFR 60.676(f) – Reporting and Recordkeeping

40 CFR 60.676(g) – Reporting and Recordkeeping

40 CFR 60.676(h) – Reporting and Recordkeeping

40 CFR 60.676(i) – Reporting and Recordkeeping

40 CFR 60.676(j) – Reporting and Recordkeeping

62-296.320(4)(b)(1) – General Visible Emissions Standard

62-297.310(4)(a)2 – General Compliance Test Requirements

62-297.310(7)(a)4 – General Compliance Test Requirements

62-297.310(7)(a)7 – General Compliance Test Requirements

62-297.310(8)(a) – Test Reports

62-297.310(8)(b) – Test Reports

MIAMI-DADE COUNTY, FLORIDA

MIAMI-DADE

DERM

ENVIRONMENTAL RESOURCES MANAGEMENT
AIR QUALITY MANAGEMENT DIVISION
33 S.W. 2nd AVENUE
SUITE 900
MIAMI, FLORIDA 33130-1540
TELEPHONE: (305) 372-6925
FAX: (305) 372-6954

CERTIFIED MAIL 7000 0600 0027 7981 6304
RETURNED RECEIPT REQUESTED

NOTICE OF PERMIT

In the Matter of an
Application for Permit by:

Mr. Hardy Johnson
Vice President, Florida Division
Tarmac America, Inc.
455 Fairway Drive
Deerfield Beach, Florida 33441

Permit No.: 0250020-012-AC
Tarmac Pennsuco
Effective Date: January 25, 2002
Expiration Date: July 31, 2002

Dear Mr. Johnson:

Enclosed is Construction Permit Number 0250020-012-AC for the aggregate plant of the Tarmac Pennsuco facility located at 11000 NW 121 Way, Medley, Miami-Dade County, issued pursuant to Chapter 403, Florida Statutes (F.S.).

Any party to this order (permit) has the right to seek judicial review of the permit pursuant to Section 120.68, F.S., by the filing of a Notice of Appeal pursuant to Rule 9.110, Florida Rules of Appellate Procedure, with the Clerk of the permitting authority in the Legal Office; and by filing a copy of the Notice of Appeal accompanied by the applicable filing fees with the appropriate District Court of Appeal. The Notice of Appeal must be filed within 30 (thirty) days from the date this Notice is filed with the Clerk of the permitting authority.

Executed in Miami-Dade County, Florida.
Department of Environmental
Resources Management

H. Patrick Wong 1/25/02

H. Patrick Wong, Chief
Air Quality Management Division

JAN 30 2002

GAINESVILLE

CERTIFICATE OF SERVICE

The undersigned duly designated clerk hereby certifies that this NOTICE OF PERMIT (including the Construction Permit) was sent by certified mail (*) and copies were mailed by U.S. Mail before the close of business on 1/25/2002 to the person(s) listed or as otherwise noted:

Hardy Johnson*
Scott Quaas, Tarmac America, Inc.
David Buff, P.E., Golder Associates
Scott Sheplak, Bureau of Air Regulation (INTERNET E-mail Memorandum)
Ms. Barbara Friday, Bureau of Air Regulation (INTERNET E-mail Memorandum)

Clerk Stamp

FILING AND ACKNOWLEDGMENT FILED, on this date, pursuant to Section 120.52(7), Florida Statutes, with the designated agency Clerk, receipt of which is hereby acknowledged.

(Clerk) 1/25/2002 (Date)

Final Construction Permit Determination

An Intent to Issue an air construction permit for Tarmac America, Inc. for its facility located at 11000 NW 121 Way, Medley, Florida to lift the limitation on hours of operation was distributed on November 2, 2001. The Notice of Intent to Issue was published in the Miami Daily Business Review on December 24, 2001.

I. Comment(s).

A. No comments were received during the public comment period. However, the following changes were made:

a. The issue date and the expiration date were added to the permit.

b. The name of the permittee was changed:

FROM: Mr. Scott Quaas, Environmental Manager

TO: Mr. Hardy Johnson
President, Florida Division

c. The first paragraph in the permit letter was reworded as follows to clarify the incorporation of the terms and conditions of Permit No. AC13-234568:

FROM: This construction permit is issued to modify federally enforceable specific conditions established in Air Construction Permit No. AC13-234568 (expired September 1995). AC13-234568 authorized the construction of the aggregate plant, which is located at 11000 NW 121 Way, in Medley, Florida, adjacent to Tarmac's Portland cement manufacturing plant. The conditions established in AC13-234568, along with the modifications herein, will be incorporated into the Title V Air Operation Permit Revision, under revision number 0250020-011-AV.

TO: This construction permit incorporates the terms and conditions of Air Construction Permit No. AC13-234568 (expired September 1995) with the modifications to Specific Conditions No.4 and No.8, as established in items numbered 1 and 2 below. AC13-234568 authorized the construction of the aggregate plant, which is located at 11000 NW 121 Way, in Medley, Florida, adjacent to Tarmac's portland cement manufacturing plant. The terms and conditions of this construction permit, Permit No.0250020-012-AC, will be incorporated into the forthcoming Title V Air Operation Permit Revision, under revision number 0250020-011-AV.

II. Conclusion.

The above-mentioned changes do not significantly affect the permit. Hence, the permitting authority hereby issues the Final Construction Permit, with any changes noted above.

MIAMI-DADE COUNTY, FLORIDA

MIAMI-DADE

DERM

ENVIRONMENTAL RESOURCES MANAGEMENT
AIR QUALITY MANAGEMENT DIVISION
33 S.W. 2nd AVENUE
SUITE 900
MIAMI, FLORIDA 33130-1540
TELEPHONE: (305) 372-6925
FAX: (305) 372-6954

January 25, 2002

CERTIFIED MAIL: 7000 0600 0027 7981 6304
RETURN RECEIPT REQUESTED

Tarmac America, Inc.
455 Fairway Drive
Deerfield Beach, Fl 33441

Authorized Representative:
Hardy Johnson
President, Florida Division

Permit No. 0250020-012-AC
Tarmac America, Inc. – Tarmac Pennsuco
Aggregate Plant
Issue Date: January 25, 2002
Expiration Date: July 31, 2002

Dear Mr. Johnson:

This construction permit incorporates the terms and conditions of Air Construction Permit No. AC13-234568 (expired September 1995) with the modifications to Specific Conditions No.4 and No.8, as established in items numbered 1 and 2 below. AC13-234568 authorized the construction of the aggregate plant, which is located at 11000 NW 121 Way, in Medley, Florida, adjacent to Tarmac's portland cement manufacturing plant. The terms and conditions of this construction permit, Permit No. 0250020-012-AC, will be incorporated into the forthcoming Title V Air Operation Permit Revision, under revision number 0250020-011-AV.

The changes in throughput and hours of operation requested by the permittee and established in this construction permit, are not expected to cause an increase in air emissions, due to the limitations on monthly and annual throughput. Therefore, Specific Condition Nos. 4 and 8 of AC13-234568, are changed as follows:

1. Specific Condition No. 4 is hereby changed:

   FROM: The overall throughput capacity of the facility shall not exceed 2,000 tons per hour (40,000 tons/day).

   TO: <u>Permitted Capacity:</u>
   a. For New Source Review (NSR) purposes, the processed raw material throughput is limited to 1,213,333 tons per month (14,560,000 tons in any consecutive 12-month period). See Table 1 of this subsection for the capacity of each component of the nonmetallic mineral processing plant equipment.
   [Rule 62-210.200, F.A.C; and, requested by the permittee in the Title V Revision Application received June 6, 2001]
   b. For testing purposes, the maximum throughput is 2,000 tons per hour.
   [Rule 297.310(2)(b), F.A.C.]

2. Specific Condition No. 8 is hereby changed:

FROM: The operation of the sources covered by this permit shall be limited to 20 hours/day, 7 days/week and 52 weeks/year.

TO: Hours of Operation: The referenced emissions unit(s) may operate continuously (8760 hours per year).
[Rule 62-210.200 (PTE), F.A.C., 0250020-012-AC; and, requested by the permittee in the Title V Revision Application received June 6, 2001]

This permit (letter) is issued pursuant to Chapter 403, Florida Statutes (F.S.). Any party to this order has the right to seek judicial review of it under Section 120.68, F.S., by filing a notice of appeal under Rule 9.110 of the Florida Rules of Appellate Procedure with the clerk of the Department of Environmental Protection in the Office of General Counsel, Mail Station #35, 3900 Commonwealth Boulevard, Tallahassee, Florida, 32399-3000, and by filing a copy of the notice of appeal accompanied by the applicable filing fees with the appropriate District Court of Appeal. The notice must be filed within thirty days after this order is filed with the clerk of the Department.

Executed in Miami-Dade County, Florida

DEPARTMENT OF ENVIRONMENTAL
RESOURCES MANAGEMENT

H. Patrick Wong 1/28/02

H. Patrick Wong, Chief
Air Quality Management Division

Enclosure: AC13-234568

cc: David A. Buff, P.E., Golder Associates Inc.
Scott Quaas, Tarmac America, Inc.

FILING AND ACKNOWLEDGMENT: FILED, on this date, pursuant to § 120.52(7), F.S., with the designated Department Clerk, receipt of which is hereby acknowledged.

Clerk Harris 1/25/02
Date

Florida Department of Environmental Protection

Lawton Chiles
Governor

Southeast District
P.O. Box 15425
West Palm Beach, Florida 33416

Virginia B. Wetherell
Secretary

PERMITTEE:
Mr. Scott Quaas, Environmental Manager
Tarmac Florida, Inc.
455 Fairway Drive
Deerfield Beach, Florida 33441

I.D. NUMBER: 50/DAD/13/0617
PERMIT/CERTIFICATION NUMBER: AC 13-234568
DATE OF ISSUE: NOV 1 8 1993
EXPIRATION DATE: October 12, 1994
COUNTY: Dade
LATITUDE/LONGITUDE: 25°52'30"N/80°22'30"W
UTM: Zone 17; 562.8 Km. E; 2861.7 Km. N
PROJECT: Tarmac Florida, Inc.
Nonmetallic Mineral Processing

This permit is issued under the provisions of Chapter 403, Florida Statutes, and Florida Administrative Code Rule 17-210, 296 and 297 and 17-4, and in conformance with all existing regulations of the Florida Department of Environmental Protection. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

MODIFY: Existing equipment in the aggregate plant. The facility consists of crushing, screening and conveying operation, storage bins, and rail and truck loadout operations. The modified facility is expected to emit maximum annual emission of 35.4 TPY of PM and 14 TPY of PM_{10} based on AP-42 emission factors calculated and submitted with application to this office (thereby avoiding PSD Review).

IN ACCORDANCE WITH: Application to Modify existing aggregate plant received July 16, 1993, and Public Notice of Intent issued October 12, 1993, and published October 25, 1993, in the Miami Daily Business Review. (none are attached)

LOCATED AT: 11000 N.W. 121 Way, Medley, Dade County, Florida.

TO SERVE: Nonmetallic mineral processing plant (SIC # 3295).

SUBJECT TO: General Conditions 1-14 and Specific Conditions 1-10.

GENERAL CONDITIONS:

(b) The period of noncompliance, including exact dates and times; or, if not corrected, the anticipated time the noncompliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the noncompliance. The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the Department for penalties or for revocation of this permit.

9. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source which are submitted to the Department, may be used by the Department as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or Department rules, except where such use is prescribed by Sections 403.111 and 403.73, F.S. Such evidence shall only be used to the extent it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

10. The permittee agrees to comply with changes in Department rules and Florida Statutes after a reasonable time for compliance; provided, however, the permittee does not waive any other rights granted by Florida Statutes or Department rules.

11. This permit is transferable only upon Department approval in accordance with Rule 17-4.120 and 17-30.300, F.A.C., as applicable. The permittee shall be liable for any noncompliance of the permitted activity until the transfer is approved by the Department.

12. This permit or a copy thereof shall be kept at the work site of the permitted activity.

13. The permittee shall comply with the following :

(a) Upon request, the permittee shall furnish all records and plans required under Department rules. During enforcement actions, the retention period for all records will be extended automatically, unless otherwise stipulated by the Department.

(b) The permittee shall hold at the facility or other location designated by this permit, records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation) required by the permit, copies of all reports required by this permit, and records of all data used to complete the application for this permit. These materials shall be retained at least three years from the date of the sample, measurement, report or application unless otherwise specified by Department rule.

(c) Records of monitoring information shall include:

- the date, exact place, and time of sampling or measurements;
- the person responsible for performing the sampling or measurements;
- the date(s) analyses were performed;
- the person responsible for performing the analyses;
- the analytical techniques or methods used; and
- the results of such analyses.

14. When requested by the Department, the permittee shall within a reasonable time furnish any information required by law which is needed to determine compliance with the permit. If the permittee becomes aware the relevant facts were not submitted or were incorrect in the permit application or in any report to the Department, such facts or information shall be submitted or corrected promptly.

NOV 1 8 1993

GENERAL CONDITIONS:

1. The terms, conditions, requirements, limitations, and restrictions set forth in this permit, are "permit conditions" and are binding and enforceable pursuant to Sections 403.141, 403.727, or 403.859 through 403.861, F.S. The permittee is placed on notice that the Department will review this permit periodically and may initiate enforcement action for any violation of these conditions.

2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this permit may constitute grounds for revocation and enforcement action by the Department.

3. As provided in subsections 403.087(6) and 403.722(5), F.S., the issuance of this permit does not convey any vested rights or any exclusive privileges. Neither does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state, or local laws or regulations. This permit is not a waiver of or approval of any other Department permit that may be required for other aspects of the total project which are not addressed in the permit.

4. This permit conveys no title to land or water, does not constitute State recognition or acknowledgement of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title.

5. This permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, or plant life, or property caused by the construction or operation of this permitted source, or from penalties therefore; nor does it allow the permittee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department.

6. The permittee shall properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this permit, as required by Department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the permit and when required by Department rules.

7. The permittee, by accepting this permit, specifically agrees to allow authorized Department personnel, upon presentation of credentials or other documents as may be required by law and at reasonable times, access to the premises where the permitted activity is located or conducted to:

(a) Have access to and copy any records that must be kept under the conditions of the permit;

(b) Inspect the facility, equipment, practices, or operations regulated or required under this permit; and

(c) Sample or monitor any substances or parameters at any location reasonably necessary to assure compliance with this permit or Department rules. Reasonable time may depend on the nature of the concern being investigated.

8. If, for any reason, the permittee does not comply with or will be unable to comply with any condition or limitation specified in the permit, the permittee shall immediately notify and provide the Department with the following information:

(a) A description of and cause of noncompliance; and

PERMITTEE:
Mr. Scott Quaas, Environmental Manager
Parmac Florida, Inc.
455 Fairway Drive
Deerfield Beach, Florida 33441

I.D. NUMBER: 50/DAD/13/0617
PERMIT/CERTIFICATION NUMBER: AC 13-234568
DATE OF ISSUE: NOV 1 8 1993
EXPIRATION DATE: October 12, 1994

SPECIFIC CONDITIONS:

1. Permit Requirements

Application for a permit to operate, along with the initial compliance test report, shall be submitted to the Department at least sixty (60) days prior to the expiration of this permit, but in no case more than fourteen (14) days after commencement of operation. In no case shall a source be operated without an appropriate operating permit. The Certification of Completion of Construction, DEP Form 17-1.202(3) may be submitted in lieu of the application for a permit to operate.

2. Emission Limiting Standards

a) In accordance with 40 CFR 60.670 (Subpart 000), Pursuant to Florida Administrative Code Rule 17-296.800 - No owner or operator shall cause to be discharged into the atmosphere from any transfer point on belt conveyors or from any other affected facility any fugitive emissions which exhibit greater than 10% opacity (15% for crushers).

b) In accordance with Florida Administrative Code Rule 17-296.310(2)(a) - Visible Emissions from primary crusher, storage piles and all other nonaffected transfer points shall be limited to 20% opacity.

3. The compliance test report shall include results of tests by the following methods:

Source/Emission Point	Pollutant	Test Method
Affected facilities (conveying, screening, storage bins, rail and truck loadout operations)	Visible Emissions	DEP Method 9
Affected facilities - crushers	Visible Emissions	DEP Method 9
Primary crusher, storage piles and all other nonaffected transfer points	Visible Emissions	DEP Method 9

The compliance test report shall be submitted to the Department in accordance with Florida Administrative Code (F.A.C.) Rule 17-297.570.

4. The overall throughput capacity of the facility shall not exceed 2,000 tons per hour (40,000 tons/day).

5. Testing of emissions should be conducted using the fuel and/or process input which are expected to result in the highest emissions and at 90 - 100% of the rated capacity of the source. If a source is not tested at 90 - 100% of rated capacity, the source may not be operated above 110% of the test load until a new test is conducted. The source is only allowed to operate for 15 days above the 110% rate to conduct the new test to regain the rated capacity in the permit.

PERMITTEE:
Mr. Scott Quaas, Environmental Manager
Parmac Florida, Inc.
455 Fairway Drive
Deerfield Beach, Florida 33441

I.D. NUMBER: 50/DAD/13/0617
PERMIT/CERTIFICATION NUMBER: AC 13-234568
DATE OF ISSUE: NOV 18 1993
EXPIRATION DATE: October 12, 1994

SPECIFIC CONDITIONS:

6. The Department and Dade County Environmental Resources Management shall be notified of expected test dates at least fifteen (15) days prior to compliance testing.

7. Copies of all reports, tests, notifications or other submittals required by this permit shall be submitted to both the Department of Environmental Protection, Southeast District Office and Dade County Environmental Resources Management.

8. The operation of the sources covered by this permit shall be limited to 20 hours/day, 7 days/week and 52 weeks/year.

9. Unconfined emissions of particulate shall be controlled by the following means:

   a) Paved parking and trafficked areas shall be maintained and kept free of particulate matter build-up.

   b) Sprinkling with water shall be used as necessary on paved areas and stockpiles.

The Permittee shall be aware of and operate under the attached "General Permit Conditions Numbers 1 thru 14". General Permit Conditions are binding upon the Permittee and enforceable pursuant to Chapter 403 of the Florida Statutes.

Executed in West Palm Beach, Florida.

MESW:nk/ms

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION

Mary E.S. Williams
Director of District Management

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☐ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☒ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Facility-Wide Unregulated Units

3. Emissions Unit Identification Number: **030**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A			**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    This emission unit contains other unregulated sources at this facility that contribute to the facility-wide emissions not addressed in any other emission unit in the application. Unregulated sources at the facility are facility-wide particulate matter fugitive emissions from miscellaneous activities such as truck operations throughout the facility, wind erosion, storage tanks, etc.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:
2. Control Device or Method Code(s):

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate:	million Btu/hr
4. Maximum Incineration Rate:	pounds/hr tons/day
5. Requested Maximum Operating Schedule:	
	hours/day — days/week
	weeks/year — hours/year
6. Operating Capacity/Schedule Comment:	

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram:	2. Emission Point Type Code: 3	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking:		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code:	6. Stack Height: feet	7. Exit Diameter: feet
8. Exit Temperature: °F	9. Actual Volumetric Flow Rate: acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment:		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Raw Material Transfer**		
2. Source Classification Code (SCC): **3-05-006-12**	3. SCC Units: **Tons Transferred or Handled**	
4. Maximum Hourly Rate: **425**	5. Maximum Annual Rate: **3,723,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Process rate is material feed on a dry basis. Equivalent to 250 TPH and 2,190,000 TPY clinker production.**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Cement Manufacturing: Dry Process: Other Not Classified**		
2. Source Classification Code (SCC): **3-05-006-99**	3. SCC Units: **Tons Cement Produced**	
4. Maximum Hourly Rate: **500**	5. Maximum Annual Rate: **2,400,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Reflects total cement production from 2,190,000 TPY clinker production.**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted:	2. Total Percent Efficiency of Control:
3. Potential Emissions: lb/hour tons/year	4. Synthetically Limited? ☐ Yes ☐ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: Reference:	7. Emissions Method Code:
8. Calculation of Emissions:	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement:	☐ Rule ☐ Other
4. Monitor Information... Manufacturer: Model Number:	Serial Number:
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☐ Not Applicable

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☐ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☐ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☐ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☐ Attached, Document ID: _____ ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☐ Attached, Document ID: _____ ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☐ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☐ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Not Applicable

Additional Requirements Comment

III. EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Application - For Title V air operation permitting only, emissions units are classified as regulated, unregulated, or insignificant. If this is an application for Title V air operation permit, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each regulated and unregulated emissions unit addressed in this application for air permit. Some of the subsections comprising the Emissions Unit Information Section of the form are optional for unregulated emissions units. Each such subsection is appropriately marked. Insignificant emissions units are required to be listed at Section II, Subsection C.

Air Construction Permit or FESOP Application - For air construction permitting or federally enforceable state air operation permitting, emissions units are classified as either subject to air permitting or exempt from air permitting. The concept of an "unregulated emissions unit" does not apply. If this is an application for air construction permit or FESOP, a separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air permitting are required to be listed at Section II, Subsection C.

Air Construction Permit and Revised/Renewal Title V Air Operation Permit Application – Where this application is used to apply for both an air construction permit and a revised/renewal Title V air operation permit, each emissions unit is classified as either subject to air permitting or exempt from air permitting for air construction permitting purposes and as regulated, unregulated, or insignificant for Title V air operation permitting purposes. **The air construction permitting classification must be used to complete the Emissions Unit Information Section of this application for air permit.** A separate Emissions Unit Information Section (including subsections A through I as required) must be completed for each emissions unit subject to air permitting addressed in this application for air permit. Emissions units exempt from air construction permitting and insignificant emissions units are required to be listed at Section II, Subsection C.

If submitting the application form in hard copy, the number of this Emissions Unit Information Section and the total number of Emissions Unit Information Sections submitted as part of this application must be indicated in the space provided at the top of each page.

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification

1. Regulated or Unregulated Emissions Unit? (Check one, if applying for an initial, revised or renewal Title V air operation permit. Skip this item if applying for an air construction permit or FESOP only.)

   ☐ The emissions unit addressed in this Emissions Unit Information Section is a regulated emissions unit.

   ☒ The emissions unit addressed in this Emissions Unit Information Section is an unregulated emissions unit.

Emissions Unit Description and Status

1. Type of Emissions Unit Addressed in this Section: (Check one)

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a single process or production unit, or activity, which produces one or more air pollutants and which has at least one definable emission point (stack or vent).

   ☐ This Emissions Unit Information Section addresses, as a single emissions unit, a group of process or production units and activities which has at least one definable emission point (stack or vent) but may also produce fugitive emissions.

   ☒ This Emissions Unit Information Section addresses, as a single emissions unit, one or more process or production units and activities which produce fugitive emissions only.

2. Description of Emissions Unit Addressed in this Section:
   Fugitive emissions from transportation, miscellaneous transfers, and storage.

3. Emissions Unit Identification Number: **031**

4. Emissions Unit Status Code:	5. Commence Construction Date:	6. Initial Startup Date:	7. Emissions Unit Major Group SIC Code:	8. Acid Rain Unit?
A	**Jan. 2003**	**June 2004**	**32**	☐ Yes ☒ No

9. Package Unit:
   Manufacturer: Model Number:

10. Generator Nameplate Rating: MW

11. Emissions Unit Comment:
    Emission unit consists of fugitive dust emissions from drop type operations and vehicular traffic in coal handling and raw materials blending area.

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

Process Enclosure

Water Sprays

2. Control Device or Method Code(s): **054, 153**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate:	
2. Maximum Production Rate:	
3. Maximum Heat Input Rate:	million Btu/hr
4. Maximum Incineration Rate:	pounds/hr tons/day
5. Requested Maximum Operating Schedule:	
24 hours/day	**7** days/week
52 weeks/year	**8,760** hours/year
6. Operating Capacity/Schedule Comment:	

Maximum process rates:

Coal/Pet Coke - 263,000 TPY
Dry Kiln Feed - 3,723,000 TPY
Additives - 266,700 TPY

C. EMISSION POINT (STACK/VENT) INFORMATION
(Optional for unregulated emissions units.)

Emission Point Description and Type

1. Identification of Point on Plot Plan or Flow Diagram:	2. Emission Point Type Code:	
3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking:		
4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:		
5. Discharge Type Code:	6. Stack Height: feet	7. Exit Diameter: feet
8. Exit Temperature: °F	9. Actual Volumetric Flow Rate: acfm	10. Water Vapor: %
11. Maximum Dry Standard Flow Rate: dscfm	12. Nonstack Emission Point Height: feet	
13. Emission Point UTM Coordinates... Zone: East (km): North (km):	14. Emission Point Latitude/Longitude... Latitude (DD/MM/SS) Longitude (DD/MM/SS)	
15. Emission Point Comment:		

D. SEGMENT (PROCESS/FUEL) INFORMATION

Segment Description and Rate: Segment 1 of 2

1. Segment Description (Process/Fuel Type): **Raw Materials Transfer**		
2. Source Classification Code (SCC): **3-05-006-12**	3. SCC Units: **Tons Transferred or Handled**	
4. Maximum Hourly Rate: **425**	5. Maximum Annual Rate: **3,723,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Annual process rate refers to maximum annual dry kiln feed.**		

Segment Description and Rate: Segment 2 of 2

1. Segment Description (Process/Fuel Type): **Mineral Products; Bulk Material Stockpiles: Coal**		
2. Source Classification Code (SCC): **3-05-103-03**	3. SCC Units: **Tons Processed**	
4. Maximum Hourly Rate: **30**	5. Maximum Annual Rate: **263,000**	6. Estimated Annual Activity Factor:
7. Maximum % Sulfur:	8. Maximum % Ash:	9. Million Btu per SCC Unit:
10. Segment Comment: **Annual process rate refers to maximum annual coal/pet coke throughput.**		

E. EMISSIONS UNIT POLLUTANTS

List of Pollutants Emitted by Emissions Unit

1. Pollutant Emitted	2. Primary Control Device Code	3. Secondary Control Device Code	4. Pollutant Regulatory Code
PM			WP
PM_{10}			WP

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM**	2. Total Percent Efficiency of Control:
3. Potential Emissions: lb/hour **23** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: Reference: **AP-42**	7. Emissions Method Code: **3**
8. Calculation of Emissions: **See Attachment TM-EU11-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions 1 of 1

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL/ESTIMATED FUGITIVE EMISSIONS

(Optional for unregulated emissions units.)

Potential/Estimated Fugitive Emissions

Complete for each pollutant identified in Subsection E if applying for an air construction permit or concurrent processing of an air construction permit and a revised or renewal Title V permit. Complete for each emissions-limited pollutant identified in Subsection E if applying for an air operation permit.

1. Pollutant Emitted: **PM_{10}**	2. Total Percent Efficiency of Control:
3. Potential Emissions: lb/hour **8** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): to tons/year	
6. Emission Factor: Reference: **AP-42**	7. Emissions Method Code: **3**
8. Calculation of Emissions: **See Attachment TM-EU11-F1.8.**	
9. Pollutant Potential/Estimated Fugitive Emissions Comment:	

F2. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION - ALLOWABLE EMISSIONS

Complete if the pollutant identified in Subsection F1 is or would be subject to a numerical emissions limitation.

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

Allowable Emissions Allowable Emissions _____ of _____

1. Basis for Allowable Emissions Code:	2. Future Effective Date of Allowable Emissions:
3. Allowable Emissions and Units:	4. Equivalent Allowable Emissions: lb/hour tons/year
5. Method of Compliance:	
6. Allowable Emissions Comment (Description of Operating Method):	

G. VISIBLE EMISSIONS INFORMATION

Complete if this emissions unit is or would be subject to a unit-specific visible emissions limitation.

Visible Emissions Limitation: Visible Emissions Limitation 1 of 1

1. Visible Emissions Subtype: **VE20**	2. Basis for Allowable Opacity: ☒ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: **20** % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance: **EPA Method 9**	
5. Visible Emissions Comment: **Rule 62-296.320(4)(b).**	

Visible Emissions Limitation: Visible Emissions Limitation _____ of _____

1. Visible Emissions Subtype:	2. Basis for Allowable Opacity: ☐ Rule ☐ Other
3. Allowable Opacity: Normal Conditions: % Exceptional Conditions: % Maximum Period of Excess Opacity Allowed: min/hour	
4. Method of Compliance:	
5. Visible Emissions Comment:	

H. CONTINUOUS MONITOR INFORMATION

Complete if this emissions unit is or would be subject to continuous monitoring.

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☐ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

Continuous Monitoring System: Continuous Monitor _____ of _____

1. Parameter Code:	2. Pollutant(s):
3. CMS Requirement: ☐ Rule ☐ Other	
4. Monitor Information... Manufacturer: Model Number: Serial Number:	
5. Installation Date:	6. Performance Specification Test Date:
7. Continuous Monitor Comment:	

I. EMISSIONS UNIT ADDITIONAL INFORMATION

Additional Requirements for All Applications, Except as Otherwise Stated

1. Process Flow Diagram (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

2. Fuel Analysis or Specification (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

3. Detailed Description of Control Equipment (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____

4. Procedures for Startup and Shutdown (Required for all operation permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable (construction application)

5. Operation and Maintenance Plan (Required for all permit applications, except Title V air operation permit revision applications if this information was submitted to the department within the previous five years and would not be altered as a result of the revision being sought)
   ☐ Attached, Document ID: _____ ☐ Previously Submitted, Date _____
   ☐ Not Applicable

6. Compliance Demonstration Reports/Records
   ☐ Attached, Document ID: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Previously Submitted, Date: _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ To be Submitted, Date (if known): _____
   Test Date(s)/Pollutant(s) Tested: _____
   ☐ Not Applicable
   Note: For FESOP applications, all required compliance demonstration records/reports must be submitted at the time of application. For Title V air operation permit applications, all required compliance demonstration reports/records must be submitted at the time of application, or a compliance plan must be submitted at the time of application.

7. Other Information Required by Rule or Statute
   ☐ Attached, Document ID: _____ ☐ Not Applicable

EMISSIONS UNIT INFORMATION
Section [11]
Fugitive Emissions

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(6) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☐ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(5)(h)6., F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document ID: _____ ☐ Not Applicable
3. Description of Stack Sampling Facilities (Required for proposed new stack sampling facilities only)
   ☐ Attached, Document ID: _____ ☐ Not Applicable

Additional Requirements for Title V Air Operation Permit Applications

1. Identification of Applicable Requirements
   ☒ Attached, Document ID: **TM-EU11-IV1** ☐ Not Applicable
2. Compliance Assurance Monitoring
   ☐ Attached, Document ID: _____ ☐ Not Applicable
3. Alternative Methods of Operation
   ☐ Attached, Document ID: _____ ☐ Not Applicable
4. Alternative Modes of Operation (Emissions Trading)
   ☐ Attached, Document ID: _____ ☐ Not Applicable
5. Acid Rain Part Application
   ☐ Certificate of Representation (EPA Form No. 7610-1)
      ☐ Copy Attached, Document ID: _____
   ☐ Acid Rain Part (Form No. 62-210.900(1)(a))
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Repowering Extension Plan (Form No. 62-210.900(1)(a)1.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ New Unit Exemption (Form No. 62-210.900(1)(a)2.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Retired Unit Exemption (Form No. 62-210.900(1)(a)3.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Compliance Plan (Form No. 62-210.900(1)(a)4.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Phase II NOx Averaging Plan (Form No. 62-210.900(1)(a)5.)
      ☐ Attached, Document ID: _____
      ☐ Previously Submitted, Date: _____
   ☐ Not Applicable

Additional Requirements Comment

Fugitive emission estimates are presented in Attachment TM-EU11-F1.8.

ATTACHMENT TM-EU11-F1.8
EMISSION CALCULATIONS

ATTACHMENT TM-EU11-F1.8a
ESTIMATED FUTURE FUGITIVE DUST EMISSIONS FROM DROP TYPE OPERATIONS

SOURCE	Type of Type of Operation[a]	M Moisture Content (%)	U Wind Speed[b] (MPH)	Emission Factor	Activity Factor	Maximum Annual PM Emissions (tons/yr)	PM_{10} Size Multiplier[d]	Maximum Annual PM_{10} Emissions (tons/yr)
COAL HANDLING FACILITIES								
Railcar Unloading for Temporary Storage	Batch Drop	7.2	8.8	0.00111 lbs/ton	87,000 TPY[e]	0.048	0.35	0.017
Temporary Coal Pile to Railcar	Batch Drop	7.2	8.8	0.00111 lbs/ton	87,000 TPY[e]	0.048	0.35	0.017
Railcar Unloading	Batch Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
Conveyor to Conveyor Transfer	Continuous Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
Conveyor to Conveyor Transfer	Continuous Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
Conveyor to Stacker Transfer (inside building)	Continuous Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
Stacker to Storage Pile (inside building)	Continuous Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
Reclaimer to Conveyor Belt (inside building)	Continuous Drop	7.2	1.3	0.00009 lbs/ton	263,000 TPY[c]	0.012	0.35	0.004
					Subtotal	0.170		0.059
RAW MATERIALS BLENDING AREA								
ADDITIVES:								
Raw Material Unloading	Batch Drop	2.0	8.8	0.00667 lbs/ton	266,700 TPY	0.890	0.35	0.311
Choke Feed Hopper/Conveyor	Continuous Drop	2.0	1.3	0.00056 lbs/ton	266,700 TPY	0.074	0.35	0.026
Conveyor to Conveyor Transfer	Continuous Drop	2.0	1.3	0.00056 lbs/ton	266,700 TPY	0.074	0.35	0.026
Conveyor to Stacker Transfer (inside building)	Continuous Drop	2.0	1.3	0.00056 lbs/ton	266,700 TPY	0.074	0.35	0.026
Stacker to Storage Pile (inside building)	Continuous Drop	2.0	1.3	0.00056 lbs/ton	266,700 TPY	0.074	0.35	0.026
Reclaimer to Conveyor Belt (inside building)	Continuous Drop	2.0	1.3	0.00056 lbs/ton	266,700 TPY	0.074	0.35	0.026
LIMESTONE:								
Aggregate Plant Conveyor to Storage Pile (inside building)	Continuous Drop	7.0	1.3	0.00010 lbs/ton	3,716,452 TPY[f]	0.179	0.35	0.063
Reclaimer to Conveyor Belt (inside building)	Continuous Drop	7.0	1.3	0.00010 lbs/ton	3,716,452 TPY[f]	0.179	0.35	0.063
					Subtotal	1.62		0.57
Total						1.79		0.63

[a] Batch Drop and Continuous Emission Factors are computed from AP-42 (US EPA, 1995) Section 13.2.4-3(1). $E = 0.0032 \times (U/5)^{1.3} / (M/2)^{1.4}$ lb/ton

[b] Based on the average wind speed measured at Miami Internation Airport of 8.8 mph unless the transfer point is enclosed in which case the minimum windspeed for which the equation maintains an "A" Quality Rating, 1. 3 mph, was used.

[c] Based on future maximum coal throughput.

[d] PM_{10} Size Multiplier is based on particles < 10 micrometers.

[e] One-third of total coal throughput could go to temporary storage pile before being placed in storage building.

[f] Based on 3,723,000 TPY total dry kiln feed, minus additives (266,700 TPY), and adjusting for moisture content of kiln feed of 7%.

ATTACHMENT TM-EU11-F1.8b
ESTIMATION OF FUTURE EMISSIONS FOR VEHICLE TRAFFIC FOR TEMPORARY OUTSIDE STORAGE OF COAL WHEN THE COAL STORAGE BUILDING IS FULL

General Data	Travel from Railcar to Pile (Unloading of Railcar for Temporary Outdoor Storage)		Travel from Pile to Railcar (Reloading of Railcar for Normal Inside Storage)		Total
	Front End Loader (loaded)	Front End Loader (unloaded)	Front End Loader (loaded)	Front End Loader (unloaded)	
Vehicle Data					
Description	Coal	Coal	Coal	Coal	
Vehicle Speed (S), mph- Average	10	10	10	10	
Vehicle weight (W), tons:					
Loaded	55.5	--	55.5	--	
Unloaded	--	47.5	--	47.5	
Vehicle number of wheels (w)	4	4	4	4	
Vehicle miles traveled (VMT)- Annual [a]	716	716	895	895	
General/ Site Characteristics					
Days of precipitation > or = 0.01 inch (p) Annually	120	120	120	120	
Silt content (s), % [b]	12	12	12	12	
Particle size multiplier, PM (k)	1.00	1.00	1.00	1.00	
Particle size multiplier, PM10 (k)	0.35	0.35	0.35	0.35	
Emission Control Data					
Emission control method	--	--	--	--	
Emission control removal efficiency, %	0	0	0	0	
Calculated PM Emission Factor (EF)					
Uncontrolled EF, lb/VMT - Annual	10.18	9.13	10.18	9.13	19.30
Controlled (Final) EF,lb/VMT- Annual	10.18	9.13	10.18	9.13	19.30
Calculated PM10 Emission Factor (EF)					
Uncontrolled EF, lb/VMT - Annual	3.56	3.19	3.56	3.19	6.76
Controlled (Final) EF,lb/VMT- Annual	3.56	3.19	3.56	3.19	6.76
Estimated Emission Rate (ER)					
Particulate Matter (PM) Emission Rate					
lbs/hr [c]	3.50	3.14	4.38	3.93	6.64
TPY	3.64	3.27	4.55	4.08	6.91
Particulate Matter 10 (PM10) Emission Rate					
lbs/hr [c]	1.23	1.10	1.53	1.37	2.33
TPY	1.28	1.14	1.59	1.43	2.42

Emission Factor (EF) Equations

Uncontrolled EF (UEF) Equation:

UEF(lb/VMT) = k x 5.9 x (s/12) x (S/30) x (W/3)^0.7 x (w/4)^0.5 x ((365 - p)/365)

Controlled (Final) EF (CEF) Equation:

CEF(lb/VMT) = UEF (lb/ton) x (100 - Removal efficiency (%))

Source: AP-42, Section 13.2.2, Unpaved Roads, January, 1995.

[a] Annual VMT calculated as follows:

Railcar Unloading (Travel Between Railcar Unloading Area and Temporary Storage Pile)

Annual VMT = 263,000 TPY coal/8 tons (bucket capacity of front-end loader) x 1/3 (amount of coal handled this way) x 300 ft travel (railcar unloading area to pile) x 1 mile/5,280 feet x 1.15 (factor to account for pile maintenance activities) = 716 miles/year

Railcar Reloading (Travel Between Temporary Storage Pile and Railcar Loading Area)

Annual VMT = 263,000 TPY coal/8 tons (bucket capacity of front-end loader) x 1/3 (amount of coal handled this way) x 375 ft travel (pile to railcar loading area) x 1 mile/5,280 feet x 1.15 (factor to account for pile maintenance activities) = 895 miles/year

[b] Tarmac Information.

[c] Assumes 2,080 hr/yr operation.

ATTACHMENT TM-EU11-F1.8c
ESTIMATION OF FUTURE EMISSIONS FOR VEHICLE TRAFFIC FOR LIMESTONE AND ADDITIVE HANDLING

General Data	Travel Between Temporary Storage Pile at Truck Unloading Area and Hopper		Total
	Front End Loader (loaded)	**Front End Loader (unloaded)**	
Vehicle Data			
Description	Additives	Additives	
Vehicle Speed (S), mph- Average	10	10	
Vehicle weight (W), tons:			
Loaded	55.5	--	
Unloaded	--	47.5	
Vehicle number of wheels (w)	4	4	
Vehicle miles traveled (VMT)- Annual [a]	2,904	2,904	
General/ Site Characteristics			
Days of precipitation > or = 0.01 inch (p) Annually	120	120	
Silt content (s), % [b]	12	12	
Particle size multiplier, PM (k)	1.00	1.00	
Particle size multiplier, PM10 (k)	0.35	0.35	
Emission Control Data			
Emission control method	Daily Watering	Daily Watering	
Emission control removal efficiency, %	50	50	
Calculated PM Emission Factor (EF)			
Uncontrolled EF, lb/VMT - Annual	10.18	9.13	19.30
Controlled (Final) EF,lb/VMT- Annual	5.09	4.56	9.65
Calculated PM10 Emission Factor (EF)			
Uncontrolled EF, lb/VMT - Annual	3.56	3.19	6.76
Controlled (Final) EF,lb/VMT- Annual	1.78	1.60	3.38
Estimated Emission Rate (ER)			
Particulate Matter (PM) Emission Rate			
lbs/hr [c]	7.10	6.37	13.48
TPY	7.39	6.63	14.01
Particulate Matter 10 (PM10) Emission Rate			
lbs/hr [c]	2.49	2.23	4.72
TPY	2.59	2.32	4.91

Emission Factor (EF) Equations

Uncontrolled EF (UEF) Equation:

UEF(lb/VMT) = k x 5.9 x (s/12) x (S/30) x (W/3)^0.7 x (w/4)^0.5 x ((365 - p)/365)

Controlled (Final) EF (CEF) Equation:

CEF(lb/VMT) = UEF (lb/ton) x (100 - Removal efficiency (%))

Source: AP-42, Section 13.2.2, Unpaved Roads, January, 1995.

[a] Annual VMT calculated as follows:

Annual VMT = 266,700 TPY/8 tons (bucket capacity of front-end loader) x 400 ft travel (truck unloading area to pile) x 1 mile/5,280 feet x 1.15 (factor to account for pile maintenance activities) = 2,904 miles/year

[b] Tarmac Information.

[c] Assumes 2,080 hr/yr operation.

ATTACHMENT TM-EU11-IV1

LIST OF APPLICABLE REGULATIONS

SEE PERMIT NO. 0250020-017-AC/PSD-FL-360

IN ATTACHMENT TM-EU1-IV1

COMPLIANCE ASSURANCE MONITORING PLAN
(CAM PLAN)

for

Titan America, LLC

Titan America Pennsuco Cement Plant

February 2006

0537642

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1.0 CAM APPLICABILITY

1.1 CAM Rule Applicability Definition

On October 26, 2000 the Florida Department of Environmental Protection (FDEP) issued the initial Title V air operation permit (Permit No. 0250020-002-AV) to Titan America, LLC for the operation of the Titan America Pennsuco Portland cement manufacturing facility in Medley, FL. The permit was revised in 2004, and issued as permit No. 0250020-013-AV. This permit expired on October 25, 2005, and the renewal application was submitted to the Florida Department of Environmental Protection (FDEP) in April, 2005. A revised renewal application is submitted with this document.

As part of the Title V renewal application, a Compliance Assurance Monitoring (CAM) Plan must be submitted as required by regulations adopted in Title 40, Part 64 of the Code of Federal Regulations (40 CFR 64). This regulation has been incorporated by reference in Rule 62-204.800, F.A.C., and implemented in Rule 62-213.440, F. A. C.

CAM plans are required for all Title V permitted emissions units using control devices to meet federally enforceable emission limits or standards, and that have pre-control emissions greater than "major" source thresholds. The term "major" is defined as in the Title V regulations (40 CFR 70), but applied on a source-by-source basis. For most non-hazardous pollutants, the major source threshold is 100 tons per year (TPY). For hazardous air pollutants (HAPs), the threshold is 10 TPY for an individual HAP, and 25 TPY for total HAPs combined.

The CAM rules contain specific exemptions from applicability of the CAM Rule. Specifically exempted from the CAM Rule are emission limitations or standards promulgated under Stratospheric Ozone Regulations contained in 40 CFR 82, the Acid Rain Program contained in 40 CFR 72, or that are part of an emissions cap included in the Title V Permit. Also exempt are emission limitations or standards proposed after November 15, 1990 under New Source Performance Standards (NSPS) contained in 40 CFR 60, and National Emission Standards for Hazardous Air Pollutants (NESHAPs) promulgated in 40 CFR 63, as these imitations and standards have equivalent monitoring requirements included as part of the standard.

Inherent process equipment (IPE), or equipment that may have the effect of controlling emissions but is installed for the primary purpose of product recovery or raw material recovery, is also exempt from CAM (40 CFR 64.1). In addition, CAM does not apply to any emission limit or standard for which the Title V permit specifies a continuous compliance determination method [40 CFR 64.2(b)(1)(vi)],

provided that the method does not include an assumed control device emission reduction factor that could be affected by the actual operation and maintenance of the control device.

1.2 Emissions Unit CAM Applicability Analysis

A review of emissions units at the Pennsuco Portland cement manufacturing facility was conducted to determine the applicability of the CAM Rule. This evaluation was conducted for each emissions unit and regulated pollutant. First, the existence of a "control device" as defined by the CAM Rule was determined on a source-by-source basis for each pollutant. Those emissions units without control devices were eliminated from further consideration.

The remaining emissions units were then evaluated on a pollutant-by-pollutant basis to determine if a control device was used to meet a federally enforceable emission limit or standard. Each pollutant without a federally enforceable emission limit or standard, emitted from a given emissions unit, was eliminated from further consideration. Uncontrolled annual emissions were then calculated for each remaining source-pollutant combination. If uncontrolled emissions for a pollutant emitted from a given emissions unit were below major source thresholds, as defined by the CAM Rule, that pollutant was not further considered.

A summary of the results of this evaluation process is presented in Table 1-1.

Each pollutant-specific emissions unit at the Pennsuco plant and its applicability to CAM is described below.

1.2.1 Coal Handling System (EU 026)

The Coal Handling System at the Pennsuco plant consists of multiple emissions units: coal transfer baghouses (461.BF130 and 461.BF230), coal mill baghouse (461.BF500), coal mill feed baghouse (461.BF350), and coal feeder baghouses (461.BF650 and 461.BF750). Except for the coal mill baghouse (461.BF500), which is considered as inherent process equipment, all other emissions points use control devices to reduce the potential particulate matter (PM) emissions. The Coal Handling System, which handles a maximum of 263,000 TPY of coal, is not subject to any federally enforceable emission limit for PM or particulate matter with aerodynamic diameter of 10 microns or less (PM_{10}), and therefore is not subject to the CAM requirements.

1.2.2 Clinker Handling and Storage System (EU 027)

The Clinker Handling and Storage System at the Pennsuco plant consists of multiple emissions units: clinker silo baghouses (481.BF930 and 481.BF140), off-spec clinker bin baghouse (481.BF330), and clinker transfer baghouses (441.BF540, 481.BF540, 481.BF640, 481.BF730, F633, and K447). All these baghouses are control devices to reduce the potential PM emissions. The Clinker Handling and Storage System, which handles a maximum of 2,190,000 TPY of clinker. is not subject to any federally enforceable emission limit for PM/PM_{10} and, therefore, is not subject to the CAM requirements.

1.2.3 Finish Mills 1, 2, 3, 4, and 6 (EU 010, 011, 012, 013, and 030)

The Pennsuco plant operates five Finish Mills (No. 1, 2, 3, 4, and 6). The Finish Mills have a total of 13 baghouses – F113, F130, F213, F230, F313, F332, 533.BF340, F432, F430, F730, 536.BF500, 516.BF510, and 536.BF340, which are emission points. Except for baghouses 533.BF340, F730, and 536.BF340, which are inherent process equipment, other emission points use control devices to reduce the potential PM emissions. However, none of the emission points have federally enforceable emission limits for PM/PM_{10} in TPY and, therefore, Finish Mills 1, 2, 3, 4, and 6 are not subject to the CAM requirements.

1.2.4 Raw Mill and Pyroprocessing System (EU 028)

The Raw Mill and Pyroprocessing System at the Pennsuco plant consist of the Raw Mill, Clinker Feed Silo, Preheater/Calciner/Kiln, Clinker Cooler, and the Kiln Dust system. Material from the Raw Mill is blown to a series of mechanical cyclones, which recover the material. The exhaust streams from the cyclones pass through the Preheater Kiln/Cooler/Raw Mill baghouse 331.BF200, before being discharged to the Main Stack. The properly sized raw material from the Raw Mill is conveyed to the Clinker Feed silo. Dust from the conveying operation is controlled by baghouse 351.BF410. Dust from the Clinker Feed Silo is controlled by baghouse 341.BF350.

Material from the Clinker Feed Silo is then conveyed to the Preheater Tower. Dust from the conveying system is controlled by baghouses 351.BF440 and 351.BF470. The material then passes through the Preheater/Calciner/Kiln system, where chemical reactions convert the raw material into clinker. The material is then conveyed to the Clinker Silos.

Kiln dust captured in the Main Stack baghouse (331.BF200) is conveyed to a storage bin. From the storage bin, the kiln dust is returned to the process in an enclosed system or is loaded out to truck.

The conveying system and the storage bin are controlled by baghouse 331.BF740. The truck loadout operation is controlled by baghouse 331.BF645.

All the baghouses are control devices to reduce the potential PM emissions. However, only the Main Stack baghouse 331.BF200 has federally enforceable emission limits for PM/PM_{10} in tons per year. Therefore, only the Main Stack baghouse 331.BF200 is potentially subject to the CAM requirements.

Emission calculations for the main stack are presented in Attachment TM-EU4-F1.8 of the Title V permit application. The controlled emissions from the Main Stack are 117.3 TPY of PM and 98.7 TPY of PM_{10}. Since the PM/PM_{10} emissions controlled by baghouse 331.BF200 are more than 100 TPY, the uncontrolled PM/PM_{10} emissions must be greater than 100 TPY, and therefore, baghouse 331.BF200 is subject to the requirements of CAM for PM. It is noted that the main stack baghouse is subject to PM/PM_{10} emission limits under 40 CFR 63, Subpart LLL. This is a post-1990 National Emission Standard for Hazardous Air Pollutants (NESHAP). However, the baghouse has an allowable emission limit that is lower than the Subpart LLL limit. Therefore, CAM applies for PM/PM_{10}.

1.2.5 Raw Material Handling (EU 029)

The Raw Material Handling System at the Pennsuco plant consists of four raw material feed bins with associated conveyors and feeders and four baghouses – 311.BF650, 311.BF750, 321.BF470, and 311.BF950. All these baghouses are control devices to reduce the potential PM/PM_{10} emissions. The Raw Material Handling System, which handles a maximum of 3,723,000 TPY of dry kiln feed, is not subject to any federally enforceable emission limit for PM/PM_{10} and therefore, is not subject to the CAM requirements.

1.2.6 Cement Storage, Packhouse, and Loadout (EU 014, 015, 016)

The Cement Storage, Packhouse, and Loadout unit consists of twelve silos for cement storage, three loadout units, a cement packaging operation and a total of thirteen baghouses. Baghouses F511, F512, F513, F514, F515, and BF-200 control PM emissions from pneumatic silo filling operations. Baghouses B110, B210, B372, B374, and B382 control PM emissions from the bulk loadout operations. Baghouses BF-120, BF-200, and BF-400 control PM emissions from the packhouse. The total potential throughput of all the twelve cement silos combined is 4,380,000 TPY of cement. The annual capacity of the Packhouse is 1,489,200 TPY. None these baghouses have federally enforceable emission limits for PM/PM_{10} and therefore are not subject to the CAM requirements.

1.2.7 Concrete Block Plant (EU 024)

The Concrete Block Plant at the Pennsuco plant consists of two cement silos and two weigh hoppers. PM/PM_{10} emissions from each silo and weigh hopper is controlled by a baghouse. The baghouses do not have any federally enforceable emission limit for PM/PM_{10}. Therefore, the Concrete Block Plant is not subject to CAM.

1.2.8 Ready Mix Plant (EU 025)

The Ready Mix Plant at the Pennsuco plant consists of four cement/flyash silos, two weigh hoppers, and seven associated baghouses. PM/PM_{10} emissions from each silo and weigh hopper is controlled by a baghouse with two baghouses serving Cement/Flyash Silo No. 3. The baghouses do not have any federally enforceable emission limit for PM/PM_{10}. The capacity of the Ready Mix plant is 250,536 tons of cement per year. Therefore, the Ready Mix Plant emission sources are not subject to CAM.

1.2.9 Aggregate Plant

The Aggregate Plant at the Titan Pennsuco facility consists of crashers, a quarry, decks, surge bin, feed piles, screens, storage bins, various storage piles, and conveyor transfer parts. There are no emission control devices at the Aggregate Plant. PM/PM_{10} emissions are controlled by partially enclosing transfer points and water sprays at all screens except scalping screens. The Aggregate Plant also does not have any federally enforceable emission limits. Therefore, the Aggregate Plant is not subject to CAM.

1.2.10 Fugitive Emissions from Transportation, Miscellaneous Transfers, and Storage

The new Fugitive Emissions (EU 031) emission unit at the Pennsuco Cement facility consists of fugitive dust emissions from drop type operations and vehicular traffic in coal handling and raw material blending area. These emissions were originally part of the Coal Handling (EU 026) and Raw Material Handling (EU 029) emission units. There are no control devices at the Pennsuco facility to control fugitive dust emissions, which is reduced by process enclosures and water sprays. Also, there are no federally enforceable emission limits for the fugitive emissions. Therefore, Fugitive Emissions (EU 031) is not subject to CAM.

2.0 PM EMISSIONS FROM PREHEATER/KILN/COOLER/RAW MILL BAGHOUSE 331.BF200

2.1 Emissions Unit Identification

Preheater/Kiln/Cooler/Raw Mill baghouse 331.BF200, also known as the Main Stack baghouse is part of the Pyroprocessing and Raw Mill Systems Operations emission unit (EU 026). Material from the Raw Mill is blown to a series of mechanical cyclones, which recover the raw material. The exhaust streams from the cyclones pass through the Preheater/Kiln/Cooler/Raw Mill baghouse (equipment ID 331.BF200), before being discharged to the Main Stack. Exhaust gas from the Clinker Cooler is sent to the Raw Mill and when the Raw Mill is not operating, sent directly to the Main Stack baghouse.

2.2 Applicable Regulations, Emissions Limits, and Monitoring Requirements

The Main Stack baghouse is a PM emission control device, which has a proposed PM emission limit of 26.8 lb/hr and a proposed PM_{10} limit of 22.5 lb/hr [Permit No. 0250020-017-AC], equivalent to 117.3 TPY of PM and 98.7 TPY of PM_{10}. The Main Stack also has emission limits for SO_2, NO_x, CO, VOC, mercury, and dioxin/furan. However, there are no control devices for these pollutants.

The Preheater/Kiln/Cooler/Raw Mill baghouse is subject to the requirements of the NESHAPs for the Portland Cement Manufacturing Industry, Subpart LLL, which limits the PM emissions to 0.30 lb/ton of dry kiln feed from the kiln/raw mill and 0.10 lb/ton from the cooler. Compliance with the PM/PM_{10} emission limits is demonstrated by annual stack testing using the Environmental Protection Agency (EPA) Method 5.

Per 40 CFR 63.1343 and 63.1345, Standard for In-Line Kiln/Raw Mills and Clinker Coolers, visible emission from the baghouse is limited to 10-percent opacity (6-minute average).

As a requirement of Subpart LLL, Pennsuco is required to monitor opacity at the Main Stack and operate a continuous opacity monitor system (COMS) [Permit No. 0250020-017-AC/PSD-FL-360]. Pennsuco currently operates a Durag D-R 290 Model continuous opacity monitoring device at the Main Stack.

2.3 Control Technology Description

When the Raw Mill is operating, dust from the preheater/kiln/cooler exhaust to the Raw Mill. Dust from the exhaust streams of the mechanical cyclones, which recover the raw material from the Raw Mill, is controlled by baghouse 331.BF200. When the Raw Mill is off, dust from the Preheater/Kiln/Cooler is directly routed through the baghouse. A detailed description of the control equipment is included in the Title V renewal application, Attachment TM-EU4-I3.

2.4 Monitoring Approach

The monitoring approach is based on monitoring opacity of the Main Stack through the existing. The monitoring approach is summarized in the table below.

	Indicator No. 1
Indicator	Opacity
Measurement Approach	Continuous opacity monitoring system (COMS).
Indicator Range	An excursion is defined as any 1-hour block average of opacity greater than 5 percent, excluding periods of start-up, shutdown and malfunction pursuant to Rule 62-210.700, F.A.C. An excursion will trigger an evaluation of operation of the baghouse. Corrective action will be taken as necessary. Excursions trigger recordkeeping and reporting requirements.
Data Representativeness	VE measurements are made in the stack.
Verification of Operational Status	Opacity monitors readout in Control Room.
QA/QC Practices and Criteria	Install and operate COMS according to 40 CFR Part 60 Appendix B, Performance Specification 1 and general provisions 60.13.
Monitoring Frequency	Opacity is monitored continuously.
Data Collection Procedures	One-minute averages are recorded through the DAS. Daily reports with all hourly averages are generated. One-hour block averages are determined from the average of all the valid one-minute averages during the one-hour block.
Averaging Period	The averaging period for opacity is a one-hour block average.

2.5 Justification

The CAM rule, in 40 CFR 64.3(d)(1), states that if a COMS is required pursuant to other authority under the Act or state of local law, the owner or operator shall use such system to satisfy the

requirements of this part. Titan must operate a COMS on the Main Stack pursuant to 40 CFR 63, Subpart LLL. Titan is proposing to use data from the COMS at the Main Stack and monitor the 1-hour block average opacity to assure compliance with the PM emission standards.

The Titan Main Stack is subject to CAM for PM emissions, not VE. Initial performance tests for PM have been performed via EPA Method 5, and consist of three test runs each typically exceeding 1 hour in duration each. The opacity data Titan has used to correlate PM emissions and opacity were the average opacity for the duration of the test run (approximately 60 minutes) (see discussion below). Therefore, a 1-hour block averaging time for the CAM opacity indicator is appropriate for compliance assurance of PM emissions. As described below, at least three power plants in Florida have received averaging times of 1-hour block duration for their CAM Plans.

Titan has researched other CAM Plans for PM for power plants that also use opacity as the CAM parameter. For Cedar Bay Generating Company, FDEP issued the CAM Plan based on a 10-percent opacity reading as the level defining an excursion. This level of opacity would have to be exceeded for five consecutive 6-minute averages in order to define an excursion. The rationale stated in the CAM Plan was as follows:

> "Based on available data under normal operation, the representative stack opacity of each unit is in the range of 3% to 7%. A 50% average opacity above 7% during non-startup or shutdown periods is atypical and may indicate a potential problem with the baghouse."

St. Johns River Power Park received an 18-percent opacity level as the CAM indicator, based on a 1-hour block average. The rationale stated in the CAM Plan was as follows:

> "Based on available data under normal operation, the representative stack opacity of each unit is in the range of 5% to 15%. In addition, the COMS are located upstream of the scrubber, and, as such, the opacity at the stack exit is lower than the value indicated by the COMS. Therefore, 18% opacity during non-startup or shutdown periods is atypical and may indicate a potential problem with the ESP."

Lakeland McIntosh received a 12-percent opacity level as the CAM indicator, based on a 1-hour average, excluding periods of startup, shutdown, and malfunction. Indiantown Cogeneration received a 6-percent opacity level as the CAM indicator, based on a 1-hour block average, excluding startup and shutdown.

For Titan, compliance with the PM standard is currently determined by the average of three test runs conducted in accordance with EPA Method 5. Data for the initial performance test runs from 2004 and 2005 were collected and are summarized in Table 2-1. Based on the opacity data from the COMS, which were also collected during the test runs, opacities of 3.1 percent were observed for a PM emission rate up to 16 lb/hr. The PM emission limit for Titan is approximately 26 lb/hr.

The variability in opacity versus PM emission rate is typical. A sudden and sustained step-increase in opacity usually indicates a potential problem with the baghouse.

Using the same rationale as for Cedar Bay Generating Company, the indicator range for the Titan Main Stack baghouse should be set at 50-percent greater than 3-percent opacity (i.e., at 5-percent opacity). A 50-percent average opacity above the normal range is atypical, and setting the indicator range at 50-percent greater than 3-percent opacity (i.e., at 5-percent opacity), is an appropriate range of opacity, above which may indicate potential problems with the baghouse. Therefore, the indicator range is set at 5-percent opacity during non-startup, shutdown, and malfunction conditions.

When an excursion occurs, corrective action will be initiated, beginning with an evaluation of the occurrence, to determine the action required (if any) to correct the situation. All excursions will be documented and reported.

TABLE 3-3
CAM APPLICABILITY DETERMINATION

Title V Emission Unit	Control Equipment ID	Title V EU ID	Control Equipment	Pollutants with Emission Limits	Uncontrolled Emission Rate (TPY) PM	CAM Plan Required? (Yes/No)	Comments
COAL HANDLING SYSTEM							
Coal Feed Bin	461.BF130	026	Baghouse	None	--	No	No pollutant with emission limit.
Pet Coke Feed Bin	461.BF230	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal mill feed	461.BF350	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal mill	461.BF500	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal (Transfer) Surge Bin Feeder	461.BF650	026	Baghouse	None	--	No	No pollutant with emission limit.
Pet coke (Transfer) Surge Bin Feeder	461.BF750	026	Baghouse	None	--	No	No pollutant with emission limit.
CLINKER HANDLING AND STORAGE SYSTEM							
Clinker transfer conveyors (cooler to clinker and off-spec silos)	441.DF540	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker Silos	481.BF140	027	Baghouse	None	--	No	No pollutant with emission limit.
Off-spec clinker silo and conveyors to clinker storage	481.BF330	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF540	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF640	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 2, 5, 18 and clinker transfer	481.BF730	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 12, 19, 20, 23, 28 and clinker transfer	F633	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 21, 22, 23, 26, 27, 28	481.DF930	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silo 17 and clinker transfer	K447	027	Baghouse	None	--	No	No pollutant with emission limit.
FINISH MILLS 1, 2, 3, 4, and 6							
Finish Mill No. 1	F113	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 1	F130	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 2	F213	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 2	F230	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3	F313	012	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3	F332	012	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3 O'Seps	533.BF340	012	None	None	--	No	No pollutant with emission limit.
Finish Mill No. 4	F432	013	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 4	F430	013	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 4 O'Seps	F340	013	None	None	--	No	No pollutant with emission limit.
Finish Mill No. 6	516.BF510	029	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 6	536.DF500	029	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 6 O'Seps	536.BF340	029	None	None	--	No	No pollutant with emission limit.
RAW MILL AND PYROPROCESSING UNIT							
Kiln/Cooler/Raw Mill	331.BF200	028	Baghouse	PM	> 100	Yes	PM uncontrolled emissions >100 TPY.
			Baghouse	PM_{10}	> 100	Yes	PM_{10} uncontrolled emissions >100 TPY.
			None	SO_2	--	No	No control device.
			None	NO_x	--	No	No control device.
			None	CO	--	No	No control device.
			None	VOC	--	No	No control device.
			None	Mercury	--	No	No control device.
			None	Dioxin	--	No	No control device.
Kiln Dust Conveyance and Storage Bin	331.BF740	028	Baghouse	None	--	No	No pollutant with emission limit.
Clinker Feed (CF) Silo	341.BF350	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (CF Silo)	351.BF410	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF440	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF470	028	Baghouse	None	--	No	No pollutant with emission limit.
Kiln Dust Truck Loadout	331.Bt645	028	Baghouse	None	--	No	No pollutant with emission limit.
RAW MATERIAL HANDLING							
Raw Material Feed Bins and Conveyors	311.DF650	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF350	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	321.BF470	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF950	029	Baghouse	None	--	No	No pollutant with emission limit.
CEMENT STORAGE, PACKHOUSE, AND LOADOUT							
Cement Silos 1-6	F-511	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silos 7-9	F-512	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 10	F-513	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 11	F-514	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 12	F-515	014	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 1	B-110	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 2	B-210	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-372	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-374	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-382	015	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-120	016	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-200	016	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-400	016	Baghouse	None	--	No	No pollutant with emission limit.
CONCRETE BLOCK PLANT							
Cement Silo No. 1	CP-310(2)	024	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo No. 2	CP-310(2)	024	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 1	CP-100	024	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 2	CP-100	024	Baghouse	None	--	No	No pollutant with emission limit.
READY MIX PLANT							
Cement/Flyash Silos No. 1	CP-310	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 2	CP-310	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 3	CP-310(2)	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 4	CP-340	025	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 1	KR-1100	025	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 2	VH-1683-JP	025	Baghouse	None	--	No	No pollutant with emission limit.
AGGREGATE PLANT							
Aggregate Plant subject to 40 CFR 60, Subpart OOO		022	None	None	--	No	No pollutant with emission limit.
Aggregate Plant not subject to 40 CFR 60, Subpart OOO		023	None	None	--	No	No pollutant with emission limit.
FUGITIVE EMISSIONS							
Fugitive Emissions		031	None	None	--	No	No pollutant with emission limit.

TABLE 1-1
CAM APPLICABILITY DETERMINATION

Title V Emission Unit	Control Equipment ID	Title V EU ID	Control Equipment	Pollutants with Emission Limits	Uncontrolled Emission Rate (TPY) PM	CAM Plan Required? (Yes/No)	Comments
COAL HANDLING SYSTEM							
Coal Feed Bin	461.BF130	026	Baghouse	None	--	No	No pollutant with emission limit.
Pet Coke Feed Bin	461.BF230	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal mill feed	461.BF350	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal mill	461.BF500	026	Baghouse	None	--	No	No pollutant with emission limit.
Coal (Transfer) Surge Bin Feeder	461.BF650	026	Baghouse	None	--	No	No pollutant with emission limit.
Pet coke (Transfer) Surge Bin Feeder	461.BF750	026	Baghouse	None	--	No	No pollutant with emission limit.
CLINKER HANDLING AND STORAGE SYSTEM							
Clinker transfer conveyors (cooler to clinker and off-spec silos)	441.BF540	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker Silos	481.BF140	027	Baghouse	None	--	No	No pollutant with emission limit.
Off-spec clinker silo and conveyors to clinker storage	481.BF330	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF540	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker transfer conveyors (clinker and off-spec silos to clinker storage)	481.BF640	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 2, 5, 18 and clinker transfer	481.BF730	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 12, 19, 20, 23, 28 and clinker transfer	F633	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silos 21, 22, 23, 26, 27, 28	481.BF930	027	Baghouse	None	--	No	No pollutant with emission limit.
Clinker storage silo 17 and clinker transfer	K447	027	Baghouse	None	--	No	No pollutant with emission limit.
FINISH MILLS 1, 2, 3, 4, and 6							
Finish Mill No. 1	F113	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 1	F130	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 2	F213	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 2	F230	010	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3	F313	012	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3	F332	012	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 3 O'Sepa	533.BF340	012	None	None	--	No	No pollutant with emission limit.
Finish Mill No. 4	F432	013	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 4	F430	013	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 4 O'Sepa	F730	013	None	None	--	No	No pollutant with emission limit.
Finish Mill No. 6	516.BF510	029	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 6	536.BF500	029	Baghouse	None	--	No	No pollutant with emission limit.
Finish Mill No. 6 O'Sepa	536.BF340	029	None	None	--	No	No pollutant with emission limit.
RAW MILL AND PYROPROCESSING UNIT							
Kiln/Cooler/Raw Mill	331.BF200	028	Baghouse	PM	> 100	Yes	PM uncontrolled emissions >100 TPY.
			Baghouse	PM_{10}	> 100	Yes	PM_{10} uncontrolled emissions >100 TPY.
			None	SO_2	--	No	No control device.
			None	NO_x	--	No	No control device.
			None	CO	--	No	No control device.
			None	VOC	--	No	No control device.
			None	Mercury	--	No	No control device.
			None	Dioxin	--	No	No control device.
Kiln Dust Conveyance and Storage Bin	331.BF740	028	Baghouse	None	--	No	No pollutant with emission limit.
Clinker Feed (CF) Silo	341.BF350	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (CF Silo)	351.BF410	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF440	028	Baghouse	None	--	No	No pollutant with emission limit.
Raw Meal Conveyance (Preheat/Calciner Tower)	351.BF470	028	Baghouse	None	--	No	No pollutant with emission limit.
Kiln Dust Truck Loadout	331.BF645	028	Baghouse	None	--	No	No pollutant with emission limit.
RAW MATERIAL HANDLING							
Raw Material Feed Bins and Conveyors	311.BF650	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF750	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	321.BF470	029	Baghouse	None	--	No	No pollutant with emission limit.
Raw Material Conveyors (Feed Bins to Raw Mill)	311.BF950	029	Baghouse	None	--	No	No pollutant with emission limit.
CEMENT STORAGE, PACKHOUSE, AND LOADOUT							
Cement Silos 1-6	F-511	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silos 7-9	F-512	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 10	F-513	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 11	F-514	014	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo 12	F-515	014	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 1	B-110	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 2	B-210	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-372	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-374	015	Baghouse	None	--	No	No pollutant with emission limit.
Bulk Loadout - Unit 3	B-382	015	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-120	016	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-200	016	Baghouse	None	--	No	No pollutant with emission limit.
Packhouse	BF-400	016	Baghouse	None	--	No	No pollutant with emission limit.
CONCRETE BLOCK PLANT							
Cement Silo No. 1	CP-310(2)	024	Baghouse	None	--	No	No pollutant with emission limit.
Cement Silo No. 2	CP-310(2)	024	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 1	CP-100	024	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 2	CP-100	024	Baghouse	None	--	No	No pollutant with emission limit.
READY MIX PLANT							
Cement/Flyash Silos No. 1	CP-310	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 2	CP-310	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 3	CP-310(2)	025	Baghouse	None	--	No	No pollutant with emission limit.
Cement/Flyash Silos No. 4	CP-340	025	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 1	KR-1100	025	Baghouse	None	--	No	No pollutant with emission limit.
Weigh Hopper No. 2	VH-1083-JP	025	Baghouse	None	--	No	No pollutant with emission limit.
AGGREGATE PLANT							
Aggregate Plant subject to 40 CFR 60, Subpart OOO		022	None	None	--	No	No pollutant with emission limit.
Aggregate Plant not subject to 40 CFR 60, Subpart OOO		023	None	None	--	No	No pollutant with emission limit.
FUGITIVE EMISSIONS							
Fugitive Emissions		031	None	None	--	No	No pollutant with emission limit.

TABLE 2-1
PM STACK TEST DATA SUMMARY

Run	Date	Time	Raw Mill	Dry Kiln Feed Rate (TPH)	Clinker Production[a] (TPH)	Particulate Matter		COMS Opacity[b] (%)
						lb/hr	lb/ton DKF	
Run 1	11/16/2004	2005-2111	OFF	319.7	212.6	10.23	0.032	0.0
Run 2	11/18/2004	0920-1027	OFF	314.3	212.6	7.82	0.025	0.0
Run 1	11/17/2004	0824-0930	ON	320.0	217.0	7.71	0.024	0.0
Run 2	11/17/2004	1449-1602	ON	334.8	217.0	6.00	0.018	0.0
Run 3	11/18/2004	1858-2002	ON	313.5	217.0	6.92	0.022	0.0
Run 5	12/3/2005	0916-1020	ON	371.9	231.0	16.0	0.043	3.1
Run 9	12/4/2005	0857-1000	ON	376.4	233.8	11.2	0.030	2.9
Run 10	12/4/2005	1037-1140	ON	379.3	235.6	14.1	0.037	3.0

[a] Average production for test period.

[b] From continous opacity monitor.