FLORIDA ROCK INDUSTRIES INC
CEMENT GROUP / 4000 N.W. CR 235 / P.O. Box 459 / Newberry, FL 32669 / (352) 472-4722

January 17, 2008

Mr. Jeff Koerner, P.E.
Bureau of Air Regulation
Department of Environmental Protection
2600 Blair Stone Road, MS #5505
Tallahassee, FL 32399-2400

RE: Application for construction permit
Facility 0010087, Permit No. 0010087-023-AV
Florida Rock Industries, Inc.—Thompson S. Baker Cement Plant

Dear Mr. Koerner:

Enclosed are four copies of an application for construction permit to make minor modification to baghouses previously permitted under 0010087-013-AC.

If you have any questions, please call Steve Cullen (Koogler & Associates) at 352-377-5822 or me at 352-472-4722, ext. 121.

Sincerely,
FLORIDA ROCK INDUSTRIES, INC.

Henry Gotsch
Environmental Manager

Department of Environmental Protection

Division of Air Resource Management

RECEIVED

JAN 18 2008

BUREAU OF AIR REGULATION

APPLICATION FOR AIR PERMIT - LONG FORM

I. APPLICATION INFORMATION

Air Construction Permit – Use this form to apply for any air construction permit at a facility operating under a federally enforceable state air operation permit (FESOP) or Title V air permit. Also 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
- Where the applicant proposes to establish, revise, or renew a plantwide applicability limit (PAL).

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 & 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: **Florida Rock Industries, Inc.**
2. Site Name: **Thompson S. Baker Cement Plant**
3. Facility Identification Number: **0010087**
4. Facility Location...
   Street Address or Other Locator: **4000 NW County Road 235**
   City: **Newberry** County: **Alachua** Zip Code: **32669**
5. Relocatable Facility? ☐ Yes ☒ No
6. Existing Title V Permitted Facility? ☒ Yes ☐ No

Application Contact

1. Application Contact Name: **Steven C. Cullen, P.E.**
2. Application Contact Mailing Address...
   Organization/Firm: **Koogler & Associates, Inc.**
   Street Address: **4014 NW 13th Street**
   City: **Gainesville** State: **Florida** Zip Code: **32609**
3. Application Contact Telephone Numbers...
   Telephone: **(352) 377-5822** ext. **19** Fax: **(352) 377-7158**
4. Application Contact Email Address: scullen@kooglerassociates.com

Application Processing Information (DEP Use)

1. Date of Receipt of Application: 1/18/08
2. Project Number(s): 0010087-031-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 construction permit to establish, revise, or renew a plantwide applicability limit (PAL).

☐ Air construction permit to establish, revise, or renew a plantwide applicability limit (PAL), and separate air construction permit to authorize construction or modification of one or more emissions units covered by the PAL.

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 INFORMATION

Application Comment

This application requests minor modifications to DEP Permit 0010087-013-AC/PSD-FL-350. The referenced permit is for the construction of the second kiln line at the existing cement plant. The following changes are requested, reflective of as-built configuration:

1. **EU009: New baghouse C21**
2. **EU009: New belt conveyor D52**
3. **EU009: Rename baghouse, from D35 to D55**
4. **EU009: Double flow rate of baghouse 2H08**
5. **EU009: Eliminate baghouse 2E34**
6. **EU011: Change quadrated clinker silo to 2 separate clinker silos**
7. **EU011: Add baghouse 2L12 (formerly Line 1 baghouse L08)**
8. **EU011: Increase flow rate of baghouse 2L15 (to remove existing Line 1 baghouse L08)**

APPLICATION INFORMATION

Scope of Application

Emissions Unit ID Number	Description of Emissions Unit	Air Permit Type	Air Permit Proc. Fee
009	Raw Mill System – Line 2	ACMM	N/A
011	Clinker Handling System – Line 2	ACMM	N/A

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 :
   Chris Horner – Plant Manager

2. Owner/Authorized Representative Mailing Address...
   Organization/Firm: **Florida Rock Industries, Inc.**
   Street Address: **4000 NW County Road 235/PO Box 459**
   City: **Newberry** State: **Florida** Zip Code: **32669**

3. Owner/Authorized Representative Telephone Numbers...
   Telephone: **(352) 472-4722** ext. Fax: **(352) 472-2449**

4. Owner/Authorized Representative Email Address: chrish@flarock.com

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 1/17/08

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: **Not applicable – construction permit**

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:
   Street Address:
   City: State: Zip Code:

4. Application Responsible Official Telephone Numbers...
   Telephone: ( ) - ext. Fax: ( ) -

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 Date

APPLICATION INFORMATION

Professional Engineer Certification

1. Professional Engineer Name: **Steven C. Cullen, P.E.**
   Registration Number: **45188**
2. Professional Engineer Mailing Address...
   Organization/Firm: **Koogler & Associates, Inc.**
   Street Address: **4014 NW 13th Street**
   City: **Gainesville** State: **Florida** Zip Code: **32609**
3. Professional Engineer Telephone Numbers...
   Telephone: **(352) 377-5822** ext. **19** Fax: **(352) 377-7158**
4. Professional Engineer Email Address: scullen@kooglerassociates.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 — Date: 1/17/2008

(seal)

* Attach any exception to certification statement.

II. FACILITY INFORMATION

A. GENERAL FACILITY INFORMATION

Facility Location and Type

1. Facility UTM Coordinates... Zone **17** East (km): **346.4** North (km): **3285.7**		2. Facility Latitude/Longitude... Latitude (DD/MM/SS): **29/41/37** Longitude (DD/MM/SS): **82/35/11**	
3. Governmental Facility Code: **0**	4. Facility Status Code: **A**	5. Facility Major Group SIC Code: **32**	6. Facility SIC(s): **3241**
7. Facility Comment : **None**			

Facility Contact

1. Facility Contact Name: **Chris Horner – Plant Manager**
2. Facility Contact Mailing Address... Organization/Firm: **Florida Rock Industries, Inc.** Street Address: **4000 NW County Road 235/P.O. Box 459** City: **Newberry** State: **Florida** Zip Code: **32669**
3. Facility Contact Telephone Numbers: Telephone: **(352) 472-4722** ext. Fax: **(352) 472-2449**
4. Facility Contact Email Address: chrish@flarock.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: **Not applicable – construction permit**
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: **NSPS Subparts Y and OOO** **NESHAP Subpart LLL**	

FACILITY INFORMATION

List of Pollutants Emitted by Facility

1. Pollutant Emitted	2. Pollutant Classification	3. Emissions Cap [Y or N]?
PM	**A**	**N**
PM10	**A**	**N**
NOX	**A**	**N**
SO2	**A**	**N**
CO	**A**	**N**
VOC	**A**	**N**
DIOX	**B**	**N**
H114	**B**	**N**
SAM	**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 No.s Under Cap (if not all units)	4. Hourly Cap (lb/hr)	5. Annual Cap (ton/yr)	6. Basis for Emissions Cap
Not applicable					

7. Facility-Wide or Multi-Unit Emissions Cap Comment: **None**

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:_____ ☒ Previously Submitted, Date: **11/04**
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: **Updated flowsheets 1, 2, 5, 7, and 8**
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:_____ ☒ Previously Submitted, Date: **11/04**

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, Modification, or Plantwide Applicability Limit (PAL):
   ☒ Attached, Document ID: **Application**
3. Rule Applicability Analysis:
   ☒ Attached, Document ID: **Application**
4. List of Exempt Emissions Units (Rule 62-210.300(3), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
5. Fugitive Emissions Identification:
   ☐ Attached, Document ID:_____ ☒ Not Applicable
6. Air Quality Analysis (Rule 62-212.400(7), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
7. Source Impact Analysis (Rule 62-212.400(5), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
8. Air Quality Impact since 1977 (Rule 62-212.400(4)(e), F.A.C.):
   ☐ Attached, Document ID:_____ ☒ Not Applicable
9. Additional Impact Analyses (Rules 62-212.400(8) 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: Not applicable

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: Not applicable

1. List of Insignificant Activities (Required for initial/renewal applications only):
   ☐ Attached, Document ID:_____ ☐ 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:_____
   ☐ 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:_____
   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:_____ ☐ Not Applicable

Additional Requirements Comment

None

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.

EMISSIONS UNIT INFORMATION
Section [1] of [2] EU 009: Raw Mill System – Line 2

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification: Not applicable

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 System – Line 2**

3. Emissions Unit Identification Number: **009**

4. Emissions Unit Status Code: **C**	5. Commence Construction Date: **July '05**	6. Initial Startup Date: **TBD**	7. Emissions Unit Major Group SIC Code: **32**	8. Acid Rain Unit? ☐ Yes ☒ No

9. Package Unit: **Not applicable**
Manufacturer: Model Number:

10. Generator Nameplate Rating: **Not applicable** MW

11. Emissions Unit Comment:
This minor modification describes changes to the emissions unit:
New baghouse C21: Controls transfers from belt C13 to belts C14 and new belt D52
New belt conveyor D52: Feeds high limestone bin from truck hopper
Rename baghouse from D35 to D55
Double flow rate of baghouse 2H08, allows eliminating baghouse 2E34

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

For this minor modification:

New baghouse C21: Controls transfers from belt C13 to belts C14 and new belt D52
Rename baghouse from D35 to D55
Double flow rate of baghouse 2H08, allows eliminating baghouse 2E34

2. Control Device or Method Code(s): **017, 018**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **255 tons per hour: wet raw material to mill**	
2. Maximum Production Rate: **Not applicable**	
3. Maximum Heat Input Rate: **40** million Btu/hr **(air heater)**	
4. Maximum Incineration Rate: **Not applicable** pounds/hr tons/day	
5. Requested Maximum Operating Schedule: hours/day weeks/year	 days/week **8760** hours/year
6. Operating Capacity/Schedule Comment: **No changes to operating capacity or schedule as a result of this minor modification.**	

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: **C21, D55, 2H08**	2. Emission Point Type Code: **3**

3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking:

Baghouses

C21	**Transfer C13, C14, D52 belts**	**[New]**
D55	**Transfer D34-D36 belts**	**[Renamed from D35]**
~~**2E34**~~	~~**Bin 2E30**~~	**[Baghouse eliminated]**
2H08	**Homogenizing silo, PH feed, Bin 2E30**	**[Flow rate increased to handle bin]**

4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:
Not applicable

5. Discharge Type Code: **H**	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:

C21	*77*	*4000*	*2*	*3854*	New
D33	77	3000	2	2891	
D55	*77*	*3000*	*2*	*2891*	Renamed
D37	77	5000	2	4818	
D49	77	5000	2	4818	
2D37	77	5000	2	4818	
2D49	77	5000	2	4818	
2E28	300	3000	2	2043	
2E34	0	0	0	*0*	Deleted
2G07	200	15000	2	11760	
2H08	200	4000	2	*3136*	Increased flow
				45846	**4037** Increased dscfm (41809 in original app.)

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: Raw Material Grinding**		
2. Source Classification Code (SCC): **3-05-006-13**	3. SCC Units: **Tons Processed**	
4. Maximum Hourly Rate: **255**	5. Maximum Annual Rate: **2,233,800**	6. Estimated Annual Activity Factor: **Not applicable**
7. Maximum % Sulfur: **Not applicable**	8. Maximum % Ash: **Not applicable**	9. Million Btu per SCC Unit: **Not applicable**
10. Segment Comment: **Segment related to this minor modification**		

Segment Description and Rate: Segment __ of __

1. Segment Description (Process/Fuel Type): **Not applicable**		
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	**017, 018**	**None**	**EL**
PM10	**017, 018**	**None**	**EL**

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL, FUGITIVE, AND ACTUAL EMISSIONS

(Optional for unregulated emissions units.)

Potential, Estimated Fugitive, and Baseline & Projected Actual 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: **Not applicable**
3. Potential Emissions: **0.35** lb/hour **1.5** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): **Not applicable** to tons/year	
6. Emission Factor: **0.01 gr/dscf** Reference: **Permit No. 0010087-013-AC, S.C. B13**	7. Emissions Method Code: **0**
8.a. Baseline Actual Emissions (if required): tons/year **[Not applicable]**	8.b. Baseline 24-month Period: From: To: **[Not applicable]**
9.a. Projected Actual Emissions (if required): tons/year **[Not applicable]**	9.b. Projected Monitoring Period: ☐ 5 years ☐ 10 years **[Not applicable]**

10. Calculation of Emissions:

Emissions information based on the change in total baghouse flow as a result of this minor modification = 4037 dscfm

0.01 gr/dscf x 4037 dscfm x 60 min/hr ÷ 7000 gr/lb = 0.35 lb/hr
@ 8760 hr/year = 1.5 TPY

11. Potential, Fugitive, and Actual Emissions Comment: **None**

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: **Rule**	2. Future Effective Date of Allowable Emissions: **Not applicable**
3. Allowable Emissions and Units: **0.01 gr/dscf**	4. Equivalent Allowable Emissions: **0.35** lb/hour **1.5** tons/year
5. Method of Compliance: **Method 9 in lieu of Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Increase in emissions from minor modification**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL, FUGITIVE, AND ACTUAL EMISSIONS

(Optional for unregulated emissions units.)

Potential, Estimated Fugitive, and Baseline & Projected Actual 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: **PM10**	2. Total Percent Efficiency of Control: **Not applicable**
3. Potential Emissions: **0.24** lb/hour **1.1** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): **Not applicable** to tons/year	
6. Emission Factor: **0.007 gr/dscf** Reference: **Permit No. 0010087-013-AC, S.C. B13**	7. Emissions Method Code: **0**
8.a. Baseline Actual Emissions (if required): tons/year **[Not applicable]**	8.b. Baseline 24-month Period: From: To: **[Not applicable]**
9.a. Projected Actual Emissions (if required): tons/year **[Not applicable]**	9.b. Projected Monitoring Period: ☐ 5 years ☐ 10 years **[Not applicable]**

10. Calculation of Emissions:

Emissions information based on the change in total baghouse flow as a result of this minor modification = 4037 dscfm

0.007 gr/dscf x 4037 dscfm x 60 min/hr ÷ 7000 gr/lb = 0.24 lb/hr
@ 8760 hr/year = 1.1 TPY

11. Potential, Fugitive, and Actual Emissions Comment: **None**

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: **Rule**	2. Future Effective Date of Allowable Emissions: **Not applicable**
3. Allowable Emissions and Units: **0.007 gr/dscf**	4. Equivalent Allowable Emissions: **0.24** lb/hour **1.1** tons/year
5. Method of Compliance: **Method 9 in lieu of Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Increase in emissions from minor modification**	

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: **10%** Maximum Period of Excess Opacity Allowed: **0** min/hour	
4. Method of Compliance: **Method 9**	
5. Visible Emissions Comment: **40CFR63.1348**	

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: **5%** Maximum Period of Excess Opacity Allowed: **0** min/hour	
4. Method of Compliance: **Method 9, in lieu of Method 5 for baghouses**	
5. Visible Emissions Comment: **62-297.620(4), F.A.C.**	

H. CONTINUOUS MONITOR INFORMATION

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

Continuous Monitoring System: Continuous Monitor ___ of ___ **Not applicable**

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: **Flowsheets 1, 2, 5**

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 **11/2004**

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 **11/2004**

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 [1] of [2] EU 009: Raw Mill System – Line 2

Additional Requirements for Air Construction Permit Applications

1. Control Technology Review and Analysis (Rules 62-212.400(10) 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(4)(d), 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 **Not applicable**

1. Identification of Applicable Requirements
   ☐ Attached, Document ID: _____
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

None

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.

EMISSIONS UNIT INFORMATION
Section [2] of [2] EU 011: Clinker Handling System – Line 2

A. GENERAL EMISSIONS UNIT INFORMATION

Title V Air Operation Permit Emissions Unit Classification: Not applicable

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 System – Line 2

3. Emissions Unit Identification Number: **011**

4. Emissions Unit Status Code: **C**	5. Commence Construction Date: **July '05**	6. Initial Startup Date: **TBD**	7. Emissions Unit Major Group SIC Code: **32**	8. Acid Rain Unit? ☐ Yes ☒ No

9. Package Unit: **Not applicable**
Manufacturer: Model Number:

10. Generator Nameplate Rating: **Not applicable** MW

11. Emissions Unit Comment:
This minor modification describes changes to the emissions unit:
- **Change quadrated clinker silo to 2 separate clinker silos**
- **Add baghouse 2L12 (formerly Line 1 baghouse L08)**
- **Increase flow rate of baghouse 2L15 (to remove existing Line 1 baghouse L08)**

Emissions Unit Control Equipment

1. Control Equipment/Method(s) Description:

For this minor modification:

- **Add baghouse 2L12 Clinker into Silo #3 (formerly Line 1 baghouse L08)**
- **Increase flow rate of baghouse 2L15 (to remove existing Line 1 baghouse L08)**
- **Baghouse 2L18 Clinker into Silo #4 (change description, formerly into quadrated silo)**

2. Control Device or Method Code(s): **016**

B. EMISSIONS UNIT CAPACITY INFORMATION

(Optional for unregulated emissions units.)

Emissions Unit Operating Capacity and Schedule

1. Maximum Process or Throughput Rate: **125 tons per hour clinker**
2. Maximum Production Rate: **Not applicable**
3. Maximum Heat Input Rate: **Not applicable**
4. Maximum Incineration Rate: **Not applicable** pounds/hr tons/day
5. Requested Maximum Operating Schedule: hours/day days/week weeks/year **8760** hours/year
6. Operating Capacity/Schedule Comment: **No changes to operating capacity or schedule as a result of this minor modification.**

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: **2L12, 2L15**	2. Emission Point Type Code: **3**

3. Descriptions of Emission Points Comprising this Emissions Unit for VE Tracking:

Baghouses

Baghouse 2L12 Clinker into Silo #3 [New, formerly existing L08]
Baghouse 2L15 Clinker transport [Increased flow rate]
Baghouse 2L18 Clinker into Silo #4 [Change description from quadrated silo]

4. ID Numbers or Descriptions of Emission Units with this Emission Point in Common:
Not applicable

5. Discharge Type Code: **H**	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:

ID	TEMP, F	ACFM	H2O	DSCFM	NOTES
2L03	300	3000	2	2043	
2L12	*300*	*4000*	*2*	*2723*	New (but formerly existing L08)
2L13	300	3000	2	2043	
2L15	*300*	*10000*	*2*	*6808*	Increased flow rate
2L16	300	4000	2	2723	
2L18	300	4000	2	2723	
				19064	**5084** Increased dscfm (13980 in original app.)

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 Transfer**		
2. Source Classification Code (SCC): **3-05-006-16**	3. SCC Units: **Tons Processed**	
4. Maximum Hourly Rate: **125**	5. Maximum Annual Rate: **1,095,000**	6. Estimated Annual Activity Factor: **Not applicable**
7. Maximum % Sulfur: **Not applicable**	8. Maximum % Ash: **Not applicable**	9. Million Btu per SCC Unit: **Not applicable**
10. Segment Comment: **Segment related to this minor modification**		

Segment Description and Rate: Segment __ of __

1. Segment Description (Process/Fuel Type): **Not applicable**		
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	**016**	**None**	**EL**
PM10	**016**	**None**	**EL**

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL, FUGITIVE, AND ACTUAL EMISSIONS

(Optional for unregulated emissions units.)

Potential, Estimated Fugitive, and Baseline & Projected Actual 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: **Not applicable**
3. Potential Emissions: **0.44** lb/hour **1.9** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): **Not applicable** to tons/year	
6. Emission Factor: **0.01 gr/dscf** Reference: **Permit No. 0010087-013-AC, S.C. B13**	7. Emissions Method Code: **0**
8.a. Baseline Actual Emissions (if required): tons/year **[Not applicable]**	8.b. Baseline 24-month Period: From: To: **[Not applicable]**
9.a. Projected Actual Emissions (if required): tons/year **[Not applicable]**	9.b. Projected Monitoring Period: ☐ 5 years ☐ 10 years **[Not applicable]**

10. Calculation of Emissions:

Emissions information based on the change in total baghouse flow as a result of this minor modification = 5084 dscfm

0.01 gr/dscf x 5084 dscfm x 60 min/hr ÷ 7000 gr/lb = 0.44 lb/hr
@ 8760 hr/year = 1.9 TPY

11. Potential, Fugitive, and Actual Emissions Comment: **Please note that although the flow rate for this emissions unit is in creasing by 5084 dscfm; 2723 dscfm of the increase is being moved out of the existing Line 1. The baghouse that is now being called 2L12 was formerly Line 1 baghouse L08. It is conservative to consider the entire increase within this minor modification.**

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: **Rule**	2. Future Effective Date of Allowable Emissions: **Not applicable**
3. Allowable Emissions and Units: **0.01 gr/dscf**	4. Equivalent Allowable Emissions: **0.44** lb/hour **1.9** tons/year
5. Method of Compliance: **Method 9 in lieu of Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Increase in emissions from minor modification**	

F1. EMISSIONS UNIT POLLUTANT DETAIL INFORMATION – POTENTIAL, FUGITIVE, AND ACTUAL EMISSIONS

(Optional for unregulated emissions units.)

Potential, Estimated Fugitive, and Baseline & Projected Actual 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: **PM10**	2. Total Percent Efficiency of Control: **Not applicable**
3. Potential Emissions: **0.31** lb/hour **1.3** tons/year	4. Synthetically Limited? ☐ Yes ☒ No
5. Range of Estimated Fugitive Emissions (as applicable): **Not applicable** to tons/year	
6. Emission Factor: **0.007 gr/dscf** Reference: **Permit No. 0010087-013-AC, S.C. B13**	7. Emissions Method Code: **0**
8.a. Baseline Actual Emissions (if required): tons/year **[Not applicable]**	8.b. Baseline 24-month Period: From: To: **[Not applicable]**
9.a. Projected Actual Emissions (if required): tons/year **[Not applicable]**	9.b. Projected Monitoring Period: ☐ 5 years ☐ 10 years **[Not applicable]**

10. Calculation of Emissions:

Emissions information based on the change in total baghouse flow as a result of this minor modification = 5084 dscfm

0.007 gr/dscf x 5084 dscfm x 60 min/hr ÷ 7000 gr/lb = 0.31 lb/hr
@ 8760 hr/year = 1.3 TPY

11. Potential, Fugitive, and Actual Emissions Comment: **None**

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: **Rule**	2. Future Effective Date of Allowable Emissions: **Not applicable**
3. Allowable Emissions and Units: **0.007 gr/dscf**	4. Equivalent Allowable Emissions: **0.31** lb/hour **1.3** tons/year
5. Method of Compliance: **Method 9 in lieu of Method 5**	
6. Allowable Emissions Comment (Description of Operating Method): **Increase in emissions from minor modification**	

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: **10%** Maximum Period of Excess Opacity Allowed: **0** min/hour	
4. Method of Compliance: **Method 9**	
5. Visible Emissions Comment: **40CFR63.1348**	

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: **5%** Maximum Period of Excess Opacity Allowed: **0** min/hour	
4. Method of Compliance: **Method 9, in lieu of Method 5 for baghouses**	
5. Visible Emissions Comment: **62-297.620(4), F.A.C.**	

H. CONTINUOUS MONITOR INFORMATION

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

Continuous Monitoring System: Continuous Monitor ___ of ___ **Not applicable**

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: **Flowsheets 7, 8**

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 **11/2004**

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 **11/2004**

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 [2] of [2] EU 011: Clinker Handling System – Line 2

Additional Requirements for Air Construction Permit Applications

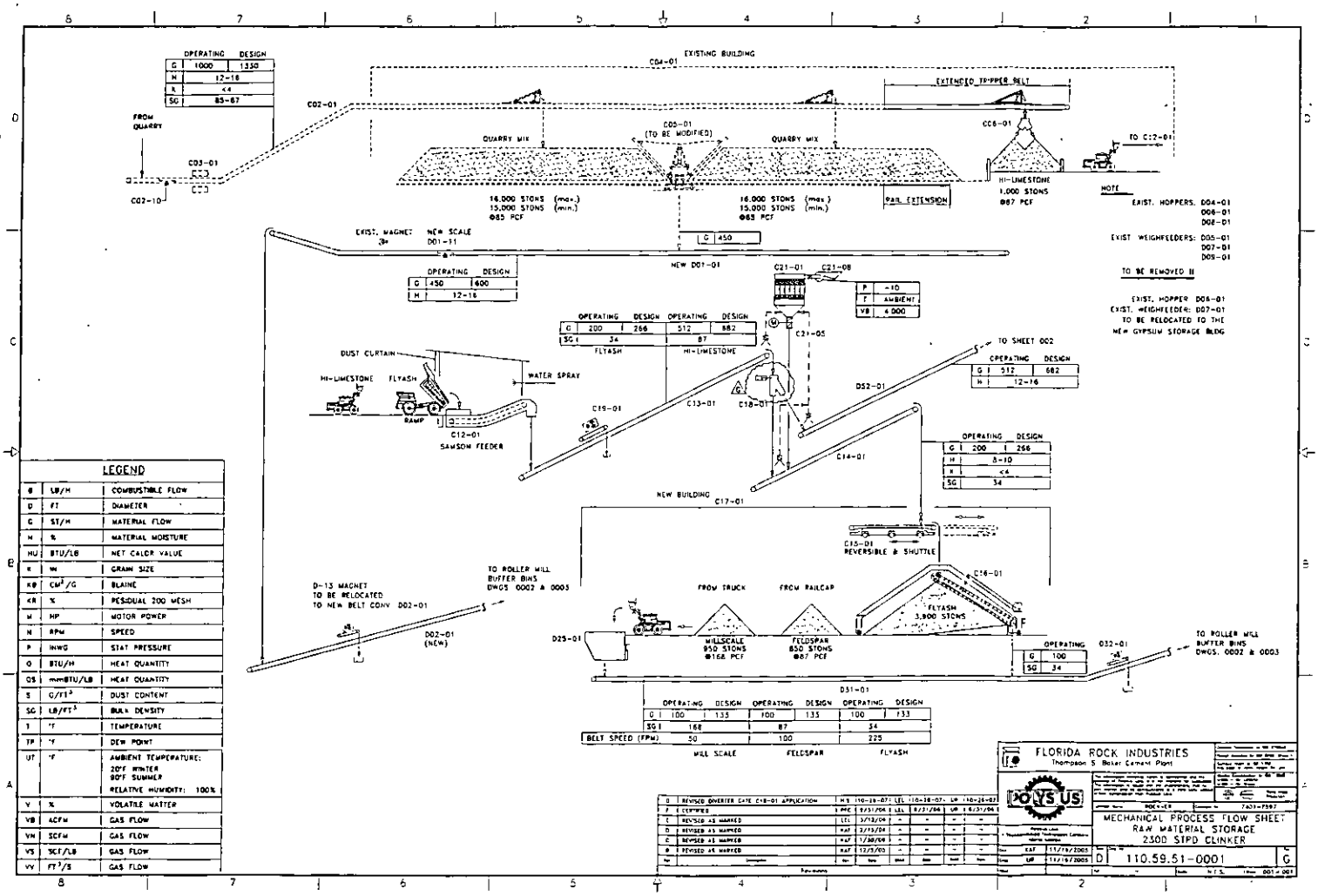
1. Control Technology Review and Analysis (Rules 62-212.400(10) and 62-212.500(7), F.A.C.; 40 CFR 63.43(d) and (e))
   ☐ Attached, Document ID: _____ ☒ Not Applicable
2. Good Engineering Practice Stack Height Analysis (Rule 62-212.400(4)(d), F.A.C., and Rule 62-212.500(4)(f), F.A.C.)
   ☐ Attached, Document 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 **Not applicable**

1. Identification of Applicable Requirements
   ☐ Attached, Document ID: _____
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

None



OPERATING	DESIGN
G 1000	1350
H 12-16	
R <4	
SG 85-87	

OPERATING	DESIGN
G 450	600
H 12-16	

OPERATING	DESIGN	OPERATING	DESIGN
G 200	266	512	682
SG 34		87	
FLYASH		HI-LIMESTONE	

P	-10
T	AMBIENT
VB	4,000

OPERATING	DESIGN
G 512	682
H 12-16	

OPERATING	DESIGN
G 200	266
H 8-10	
R <4	
SG 34	

OPERATING	DESIGN
G 100	
SG 34	

	OPERATING	DESIGN	OPERATING	DESIGN	OPERATING	DESIGN
G	100	135	100	135	100	133
SG	168		87		34	
BELT SPEED (FPM)	50		100		225	
	MILL SCALE		FELDSPAR		FLYASH	

LEGEND

B	LB/H	COMBUSTIBLE FLOW
D	FT	DIAMETER
G	ST/H	MATERIAL FLOW
M	%	MATERIAL MOISTURE
HU	BTU/LB	NET CALOR VALUE
R	M	GRAIN SIZE
KB	CM^2/G	BLAINE
KR	%	RESIDUAL 200 MESH
M	HP	MOTOR POWER
N	RPM	SPEED
P	INWG	STAT PRESSURE
Q	BTU/H	HEAT QUANTITY
QS	mmBTU/LB	HEAT QUANTITY
S	G/FT^3	DUST CONTENT
SG	LB/FT^3	BULK DENSITY
T	°F	TEMPERATURE
TP	°F	DEW POINT
UT	°F	AMBIENT TEMPERATURE: 20°F WINTER 90°F SUMMER RELATIVE HUMIDITY: 100%
V	%	VOLATILE MATTER
VB	ACFM	GAS FLOW
VN	SCFM	GAS FLOW
VS	SCF/LB	GAS FLOW
VV	FT^3/S	GAS FLOW

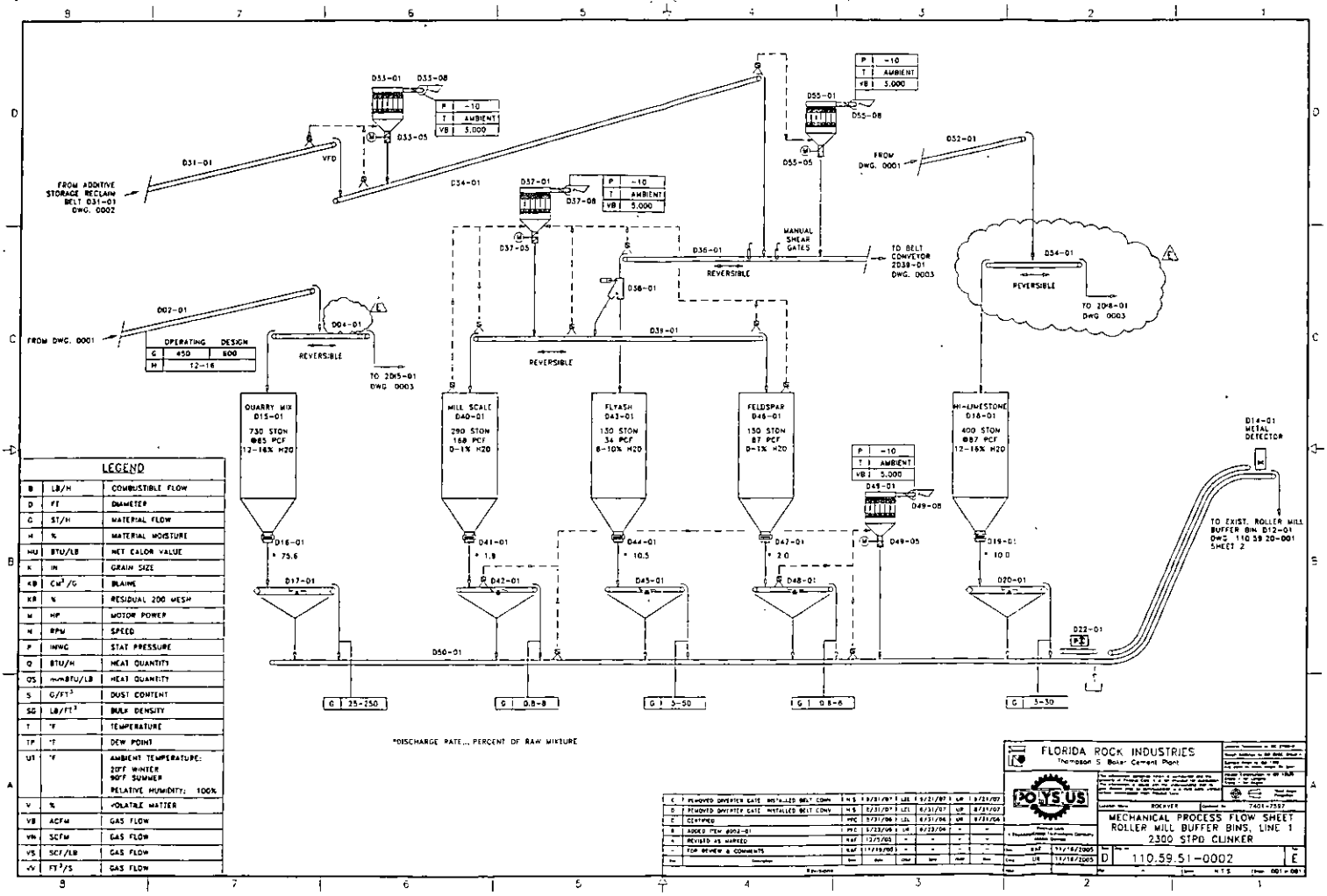
D	REVISED ON/OFF GATE C18-01 APPLICATION	MS	10-28-07	LEL	10-28-07	LP	10-26-07	
C	REVISED AS MARKED	LEL	3/13/06	-	-	-	-	
B	REVISED AS MARKED	KAF	2/13/06	-	-	-	-	
A	REVISED AS MARKED	KAF	1/30/06	-	-	-	-	
0	REVISED AS MARKED	KAF	12/5/05	-	-	-	-	
No.	Description	Init.	Date	Init.	Date	Init.	Date	

FLORIDA ROCK INDUSTRIES
Thompson S. Baker Cement Plant

POLYSIUS

MECHANICAL PROCESS FLOW SHEET
RAW MATERIAL STORAGE
2300 STPD CLINKER

D 110.59.51-0001 G



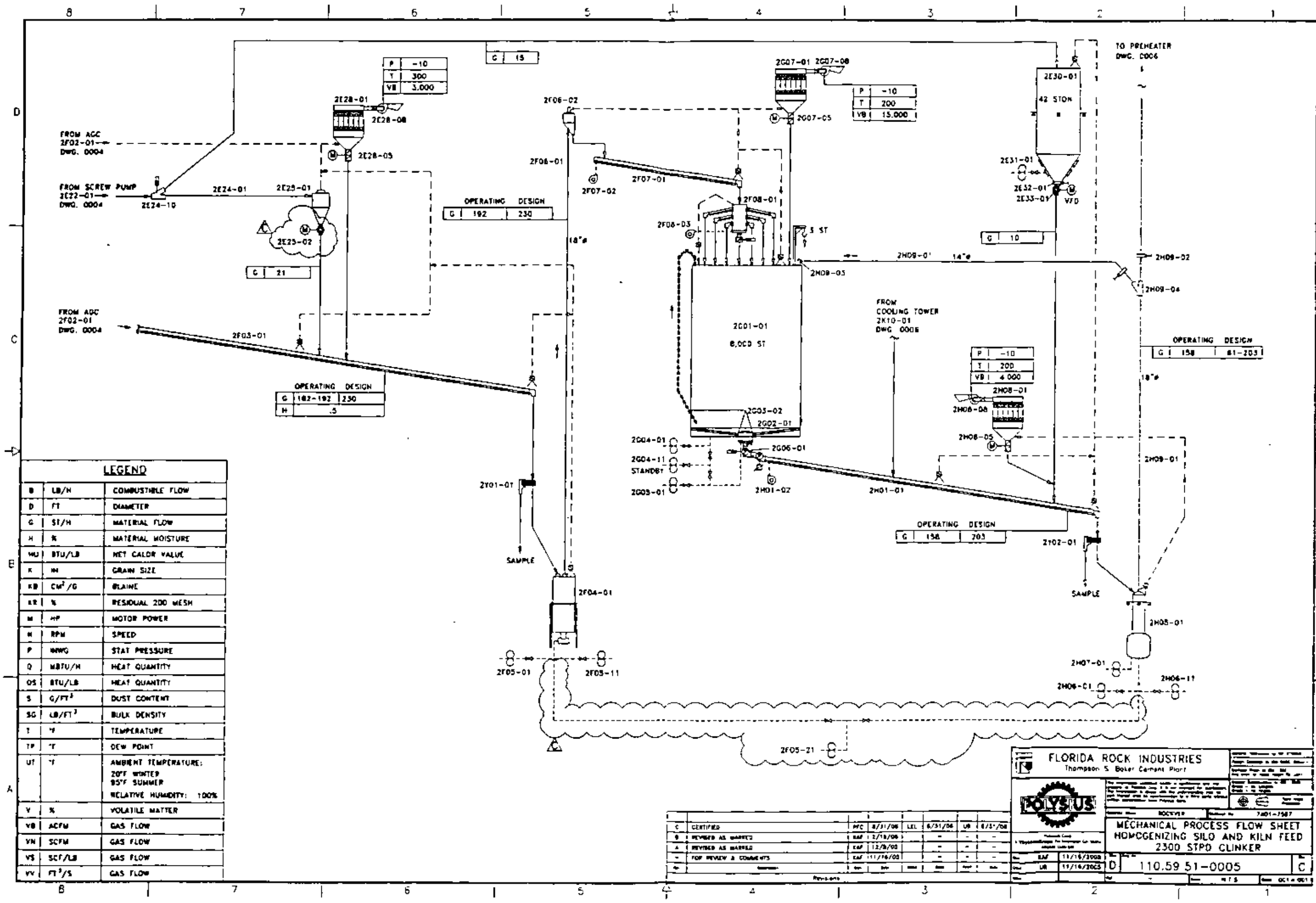
*DISCHARGE RATE... PERCENT OF RAW MIXTURE

LEGEND

B	LB/H	COMBUSTIBLE FLOW
D	FT	DIAMETER
G	ST/H	MATERIAL FLOW
H	%	MATERIAL MOISTURE
HU	BTU/LB	NET CALOR VALUE
K	IN	GRAIN SIZE
KB	CM^2/G	BLAINE
KR	%	RESIDUAL 200 MESH
M	HP	MOTOR POWER
N	RPM	SPEED
P	INWG	STAT PRESSURE
Q	BTU/H	HEAT QUANTITY
QS	mmBTU/LB	HEAT QUANTITY
S	G/FT^3	DUST CONTENT
SG	LB/FT^3	BULK DENSITY
T	°F	TEMPERATURE
TP	°F	DEW POINT
U1	°F	AMBIENT TEMPERATURE: 20FT WINTER 90FT SUMMER
		RELATIVE HUMIDITY: 100%
V	%	VOLATILE MATTER
VB	ACFM	GAS FLOW
VN	SCFM	GAS FLOW
VS	SCF/LB	GAS FLOW
VV	FT^3/S	GAS FLOW

C	REMOVED DIVERTER GATE INSTALLED BELT CONV	MS	8/31/07	LEL	8/31/07	LR
D	REMOVED DIVERTER GATE INSTALLED BELT CONV	MS	8/31/07	LEL	8/31/07	LR
E	CENTERED	MC	8/31/06	LEL	8/31/06	LR
B	ADDED ITEM #002-01	MC	8/23/06	LR	8/23/06	-
A	REVISED AS MARKED	KAF	12/5/05	-	-	-
-	FOR REVIEW & COMMENTS	KAF	11/18/2005	-	-	-

FLORIDA ROCK INDUSTRIES
Thompson S. Baker Cement Plant
POLYSIUS
ROCKVER
7401-7597
MECHANICAL PROCESS FLOW SHEET
ROLLER MILL BUFFER BINS, LINE 1
2300 STPD CLINKER
D 110.59.51-0002 E
KAF 11/18/2005
LR 11/18/2005
SCALE: NTS
SHEET 001 OF 001



		LEGEND
B	LB/H	COMBUSTIBLE FLOW
D	FT	DIAMETER
G	ST/H	MATERIAL FLOW
H	%	MATERIAL MOISTURE
HU	BTU/LB	NET CALOR VALUE
K	IN	GRAIN SIZE
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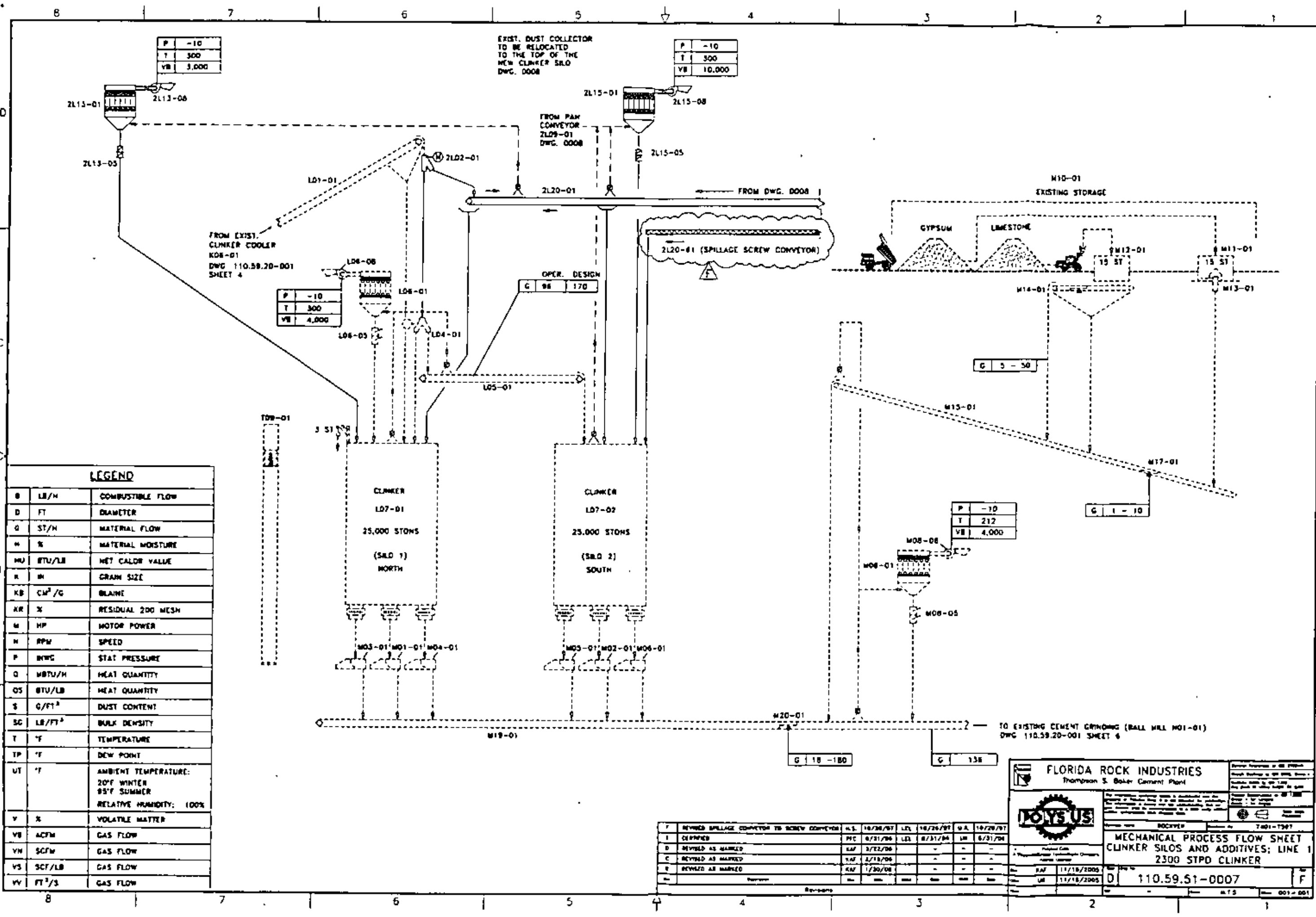
N	RPM	SPEED
P	INWG	STAT PRESSURE
Q	MBTU/H	HEAT QUANTITY
QS	BTU/LB	HEAT QUANTITY
S	G/FT³	DUST CONTENT
SG	LB/FT³	BULK DENSITY
T	°F	TEMPERATURE
TP	°F	DEW POINT
UT	°F	AMBIENT TEMPERATURE: 20°F WINTER 95°F SUMMER RELATIVE HUMIDITY: 100%
V	%	VOLATILE MATTER
VB	ACFM	GAS FLOW
VN	SCFM	GAS FLOW
VS	SCF/LB	GAS FLOW
VV	FT³/S	GAS FLOW



LEGEND

B	LB/H	COMBUSTIBLE FLOW
D	FT	DIAMETER
G	ST/H	MATERIAL FLOW
H	%	MATERIAL MOISTURE
HU	BTU/LB	NET CALOR VALUE
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VS	SCF/LB	GAS FLOW
VV	FT^3/S	GAS FLOW

F	REVISED SPILLAGE CONVEYOR TO SCREW CONVEYOR	H.S.	10/26/07	LEL	10/26/07	U.A.	10/26/07
1	CERTIFIED	PFC	6/31/06	LEL	6/31/06	LH	6/31/06
D	REVISED AS MARKED	KAF	3/22/06		-	-	-
C	REVISED AS MARKED	KAF	2/15/06		-	-	-
E	REVISED AS MARKED	KAF	1/30/06		-	-	-

Revisions

FLORIDA ROCK INDUSTRIES
Thompson S. Baker Cement Plant

POLYSIUS

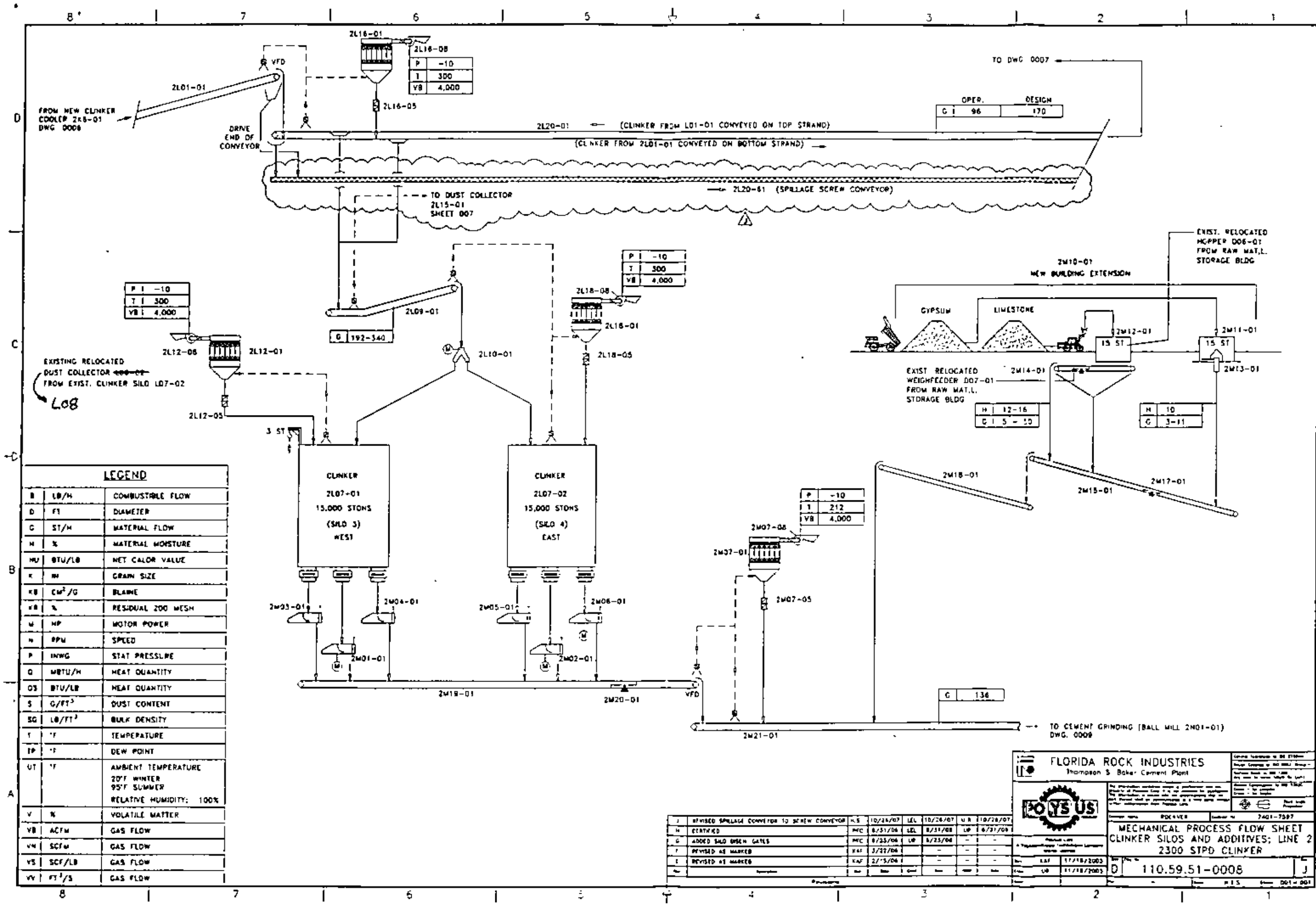
MECHANICAL PROCESS FLOW SHEET
CLINKER SILOS AND ADDITIVES; LINE 1
2300 STPD CLINKER

KAF 11/15/2005
LH 11/15/2005

D 110.59.51-0007 F

NTS

001 - 001



LEGEND		
B	LB/H	COMBUSTIBLE FLOW
D	FT	DIAMETER
G	ST/H	MATERIAL FLOW
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HU	BTU/LB	NET CALOR VALUE
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