

4014 NW 13th STREET GAINESVILLE, FL 32609-1923 352/377-5822 • FAX/377-7158

# RECEIVED

JUL 24 2009

KA 624-08-04 July 23, 2009

Ms. Susan Devore
BUREAU OF AFR REGULATION Bureau of Air Regulation
Department of Environmental Protection
2600 Blair Stone Road, MS # 5500
Tallahassee, Florida 32399-2400

SUBJECT:

Response to Request for Additional Information (RAI) dated March 20, 2009

Suwannee American Cement - Branford, Suwannee County

DEP File No. 1210465-016-AC (PSD-FL-259G)

Maria State

Alternative Fuel Materials Testing - SAC Cement Kiln

P.E. Certification

Dear Ms. Devore:

This letter provides the RAI response information requested by your letter to Tom Messer of Suwannee American Cement dated March 20, 2009 regarding the subject permit application. In accordance with Rule 62-4.050(3), I have sealed this letter with enclosure as certification by a professional engineer. Enclosed please find four (4) copies of this RAI response. I trust this response addresses the information of your request and appreciate your expedited review.

Please feel free to contact me at (352) 377-5822 or <a href="mlee@kooglerassociates.com">mlee@kooglerassociates.com</a> if you have any questions regarding this submittal.

Sincerely,

Max Lee, Ph.D., P.E.

Date

Cc:

via email

Trina Vielhauer, FDEP: Trina Vielhauer@dep.state.fl.us

Jeff Koerner, FDEP: <u>Jeff Koerner@dep.state.fl.us</u>: A.A. Linero, FDEP: <u>alvaro.linero@dep.state.fl.us</u>

Chris Kirts, FDEP NED: christopher.kirts@dep.state.fl.us Greg Strong, FDEP NED: greg.strong@dep.state.fl.us

Kathy Forney, EPA Region 4: forney kathleen@epa.gov
Heather Abrams, EPA Region 4: abrams heather@epa.gov

Ken Feely, EPA Region 4: feely ken@epa.gov

Larry Fitchhorn, EPA Region 4: Fitchhorn.Larry@epa.gov

Joe Horton, SAC: jbhorton@vcnainc.com

Celso Martini, SAC: <u>cmartini@suwanneecement.com</u> Tom Messer, SAC: <u>tomm@suwanneecement.com</u>

Krishna Cole, SAC: krishnac@suwanneecement.com

James Wold, Gerdau Ameristeel: JWold@GerdauAmeriSteel.com

Enclosure: 4 copies-AC Permit Application RAI Response

1. Polychlorinated biphenyls (PCB) have been detected in autofluff. The PCB may come from variety of sources including: insulting materials in capacitors for appliances manufactured prior to 1979, insulating materials in transformers, softening agents for plastics, hydraulic fluids, lubricants and heat transfer coolants. Although there are several programs to eliminate PCB from entering the autofluff stream, PCB levels continue to be detected in autofluff. We have information that regulatory requirements under the Toxic Substances Control Act (TSCA) created issues with autofluff as an acceptable alternative fuel. It is our understanding the autofluff supplier must certify that all chemical substances in each autofluff shipment complies with all applicable rules and orders under the TSCA. Please provide additional information regarding the quality assurance and quality control procedures that will be used to ensure that the autofluff will not contain significant amounts of PCB and comply with TSCA provisions. Provide examples of the documentation that will be used to satisfy the federal requirements for certification, testing, record keeping and reporting under 40 CFR 761.185 and 193.

SAC appreciates the efforts of the Department and the EPA to effectively address the concerns of the above comment regarding TSCA created issues with autofluff. As you are aware, several conversations have been held on this issue with the various concerned parties which culminated in the conference call meeting held on July 2, 2009 between the following parties:

### Florida Department of Environmental Protection

Trina Vielhauer Alavaro Linero Jeff Koerner Susan Devore

### US Environmental Protection Agency

Ken Feely, Region 4 - TSCA Division Larry Fitchhorn, Region 4 - TSCA Division Mazzie Talley, Region 7 Otis Johnson, Region 7

#### Gerdau Ameristeel

James Wold - Jacksonville, FL Steel Mill Jack Skelly - Wilton, IA Steel Mill Dale Harmon - Midlothian, TX Steel Mill Paul Wright - Corporate

#### Suwannee American Cement

Celso Martini Tom Messer Joe Horton Krishna Cole Natasha Lago The meeting was held to bring all concerned parties together to express the issues regarding TSCA and possible solutions. Based on in-depth discussions at this meeting, SAC proposes the following conditions to address the concerns of the Department.

The ASR shredder companies that SAC will employ shall have Quality Assurance and Source Control Plans that satisfy EPA Region IV TSCA Division requirements for reasonable assurance that PCB source material is removed prior to shredding and that all ASR supplied to SAC is TSCA exempt. A sources plan must be reviewed and qualified by the EPA Region 4 - TSCA Division prior to acceptance as a source by SAC. Control measures taken by these plans, include weekly sampling and analysis of materials and employee training procedures that specifically address inspection and removal of materials expected to contain PCBs from the process. An example of Gerdau Ameristeel's Wilton, IA facility's Quality Control Procedures and Plan is attached (Attachment A). This plan has been approved by the Air Quality Bureau of IDNR (see approval letter, Attachment A).

In addition to any measures taken by suppliers, SAC shall implement its own quality assurance and quality control (QA/QC)plan as required by ISO 9001 and 14001 standards. The QA/QC plan was illustrated in SAC's response to question number two (2) of the Department's request for additional information dated December 10, 2008. As part of the QA/QC plan outlined in that response SAC will collect composites for analysis that would include determination of PCB concentrations. This information will be provided both to the source company and to the Department.

2. For any trial of autofluff, it will be necessary to monitor the mercury emissions from the kiln. Please provide cost estimates for the use and analysis of mercury sorbent traps and the use of a continuous emissions monitoring system to measure and record mercury emissions. The cost estimates should consider appropriate monitoring for each of the various requested operating scenarios (autofluff/coal and raw mill on, autofluff/coal and raw mill off, autofluff/coal/fly ash and raw mill on, autofluff/coal/fly ash and raw mill off, etc.) for the duration of the trial

A response, under P.E. seal, to this question was provided by letter to the Department dated June 8, 2009.

## ATTACHMENT A

Approval Letter from IDNR - Air Quality Bureau Example Quality Control Procedures and Plan



# STATE OF IOWA

CHESTER J. CULVER, GOVERNOR PATTY JUDGE, L.T. GOVERNOR

DEPARTMENT OF NATURAL RESOURCES
RICHARD A. LEOPOLD, DIRECTOR

Certified Mail

July 8, 2009

Nalin Joshi Lafarge North America 301 E. Front Street P.O. Box 690 Buffalo, IA 52728

Re: DNR Project No: 08-579; Plant No: 82-04-005 Use of Auto Fluff for an Alternative Raw Material

Dear Mr. Joshi:

The Department has reviewed your request for approval to use auto fluff as an alternative raw material in your process. At this time, the Department is approving your request under the conditions listed in this letter.

A composite sample of each shipment of auto fluff received shall be collected. This sample shall be analyzed to determine the average chlorine content of the material received. If the average chlorine content of two consecutive shipments exceeds a value of 1.0%, the owner/operator shall conduct dioxin/furan testing required by the National Emission Standard for Hazardous Air Pollutants (40 CFR 63, Subpart LLL) within 60 days of the receipt of the second shipment. This testing shall be conducted using auto fluff in the process at a rate similar to the maximum historical usage rate for auto fluff.

Additionally, this approval is subject to all existing limitations in the construction permit for the kiln system located at your facility. These include but are not limited to the limitation on the amount of alternative raw material used as well as the necessary record keeping requirements to demonstrate compliance with that limitation.

Please note that this approval only applies to the air quality program and does not constitute an approval by all Department program areas. Any additional approvals for the use of this alternative raw material should be obtained from the appropriate bureaus within the Department or administrating authority prior to the use of this alternative raw material.

If you have any questions concerning this determination, please contact me at (515) 281-4842. If you have any general construction permitting questions, please contact our construction permitting hotline at 1-877-AIR-IOWA (1-877-247-4692).

Sincerely.

Long

Corey Detter, P.E. Environmental Engineer

Air Quality Bureau

C: File No: 82-04-005 Field office: 6







# **Annual Scrap Certification for Commercial Suppliers- CY 2008**

☐ CERTIFY TO ABOVE STATEMENT ☐ NOT APPLICABLE TO OUR SCRAP
Motor Vehicle Scrap Certification In compliance with 40 CFR 63 Subpart YYYYY, this certifies that the motor vehicle scrap has been depleted, to the extent practicable, of mercury-containing convenience light switches, undrained oil filters, free organic liquids, and lead-containing components such as batteries, battery cables, and wheel weights prior to being sold to Gerdau Ameristeel or Gerdau Ameristee Recycling.
☐ CERTIFY TO ABOVE STATEMENT ☐ NOT APPLICABLE TO OUR SCRAP
<u>Clean or Unrestricted Scrap Certification</u> In compliance with 40 CFR 63 Subpart YYYYY, this certifies that the scrap meets the definition clean or unrestricted scrap, contains no motor vehicle scrap, and is not expected to contain free organic liquids, chlorinated plastics, and lead or lead-containing components prior to being sold Gerdau Ameristeel or Gerdau Ameristeel Recycling.
☐ CERTIFY TO ABOVE STATEMENT ☐ NOT APPLICABLE TO OUR SCRAP
Gerdau Ameristeel Scrap Certification This certifies that all scrap prior to delivery meets all requirements of Gerdau Ameristeel's Scrap Specifications and Prohibitions for the specific scrap grades (provided with this document) prior being sold to Gerdau Ameristeel or Gerdau Ameristeel Recycling.  CERTIFY TO ABOVE STATEMENT
NAME (Print)
Signature Date
Company Name
Company Address
CITY, STATEZIP





# POLLUTION PREVENTION PLAN FOR THE CONTROL OF CONTAMINANTS IN SCRAP UNDER THE AREA SOURCE RULE FOR ELECTRIC ARC FURNACE (EAF) STEELMAKING FACILITIES

Contaminants such as chlorinated plastics, free organic liquids, lead (except for leaded steel) and mercury are not appropriate or desired for the production of steel in EAF facilities. However, these contaminants are found in the scrap metal that is the basic feedstock for the production of new steel.

EPA has identified EAF facilities as potential sources of HAP emissions and, on December 28, 2007, promulgated final regulations (codified at 40 CFR 63 Subpart YYYYY) intended to control or minimize such emissions.

The regulations require EAF facilities, among other things, to restrict the use of certain scrap or follow a pollution prevention plan (PPP) for scrap purchased as production feedstock to minimize the amount of specified contaminants in such scrap.

Gerdau Ameristeel Wilton is committed to complying with the requirements of the EAF Area Source Rule and to the goal of removing at least 80% of mercury convenience-light switches from motor vehicle scrap. Gerdau Ameristeel Wilton is also committed to minimizing to the extent practicable the presence of other contaminants in scrap that may result in the emission of hazardous air pollutants (HAP).

Accordingly, Gerdau Ameristeel Wilton has adopted and will comply with the provisions of this PPP designed to control the presence of such contaminants in scrap that is consumed in the EAF by adopting:

- 1. A specification for scrap that addresses contaminants identified by EPA
  - Gerdau Ameristeel Scrap Specifications (available at gerdauameristeel.com)
  - GA-Wilton Scrap Specifications
- 2. Procedures for verifying compliance with the specification
  - GA-Wilton Scrap Pollution Prevention Plan and Procedures
- 3. Procedures for taking corrective action against vendors who do not comply with the specification
  - GA-Wilton Scrap Non-Conformance Policy
- 4. Program policies, implementation elements, and training and outreach materials sufficient to demonstrate how Gerdau Ameristeel Wilton will appropriately implement its responsibilities under the EPA-approved National Vehicle Mercury Switch Recovery Program (NVMSRP) or other EPA-approved program.
  - GA-Wilton Letter to Suppliers, Scrap Specifications, Annual Scrap Certifications, Mercury Switch Pay-at-the-Gate Program, and ELVS publicly available information.

This PPP must be approved by USEPA or a delegated authority. Any deficiencies identified by the permitting authority must be addressed within 60 days of disapproval of the PPP. A copy of the plan and supportive documentation must remain onsite for a period of three years.

The terms used in this Pollution Prevention Plan and in the outreach materials attached and incorporating to the PPP shall have the same definitions as those enumerated in EPA's Final Area Source Rule found at 40 CFR Part 63 Subpart YYYYY. As outlined in the final rule, the term "mercury switch" denotes only mercury switches that are part of a convenience light switch mechanism installed in a vehicle.

Revision Date: June 20, 2008 Page 1 of 5





### I. General Scrap Specifications:

The following restrictions apply to all scrap steel purchased or used by Gerdau Ameristeel Wilton in its EAF steelmaking process:

- A. Scrap materials must be depleted to the extent practicable of undrained used oil filters, chlorinated plastics, and free organic liquids at the time of charging to the furnace.
- **B.** Lead-containing components of scrap, such as batteries, battery cables, and wheel weights, must be removed, to the extent practicable, prior to charging in the furnace unless the scrap is used to produce leaded steel.
- C. Scrap must be purchased from providers that have minimized the presence of mercury in scrap through participation in the NVMSRP or another EPA-approved program.

### II. Verification of Compliance with Specifications

- A. Free Organic Liquids, Chlorinated Plastics, Lead and Lead-Containing Components:
  - 1. <u>Visual Inspection</u>: Gerdau Ameristeel Wilton facility conducts a visual inspection of incoming scrap loads to ensure that the scrap meets existing quality and/or purchase order specifications for grade, type, density, and content. Scrap inspection will be required also to determine whether there is an obvious presence of free organic liquids, chlorinated plastics, or lead-containing components. Records of scrap inspections will be maintained on site for one year. Scrap inspection records shall include the identity of the scrap provider for any load that fails visual inspection. Foreign materials will be removed to the extent practicable prior to charging to the furnace, and the scrap supplier will be subject to corrective action.
  - 2. <u>Inspection for Free Organic Liquids</u>: Turnings, borings, and other forms of scrap that were generated as a result of the processing of metal with use of cutting, lubricating or cooling fluids will be visually inspected prior to charging to the furnace to ensure that such scrap does not contain free organic liquids.
  - 3. <u>Depletion of Lead and Chlorinated Plastics from Shredded Scrap</u>: Scrap that has been processed through a shredder that utilizes magnetic or density separation techniques to separate ferrous and non ferrous materials will be presumed to be depleted scrap of chlorinated plastics and lead to the extent practicable.
  - 4. <u>Inspections</u>: Gerdau Ameristeel Wilton shall identify any scrap provider whose scrap (except as described in Paragraph 5 below) is not subject to inspection pursuant to this plan. Gerdau Ameristeel Wilton shall audit or inspect the facilities from which such uninspected scrap is provided on a periodic basis at a rate of not less than 10-25% of such facilities each year.
  - 5. <u>Unrestricted Scrap</u>: Certain types of scrap, including "factory bundles," "demolition debris," "home scrap," "return scrap", "rail," and "flashings," as defined by common industry practice, as well as similar uncontaminated scrap, are not expected to contain free organic liquids, chlorinated plastics, or lead and

Revision Date: June 20, 2008 Page 2 of 5





- will be presumed to be free of these contaminants. This scrap is not subject to the inspection and verification requirements of this plan.
- 6. <u>Baghouse Bags, Internal Process and Maintenance Materials</u>: Baghouse bags and baghouse maintenance materials that are routinely recycled by charging to the electric arc furnace, including personal protective equipment (PPE) and baghouse dust, are exempt from this PPP and not subject to the inspection and verification requirements of this plan.

#### B. Mercury

- 1. Gerdau Ameristeel Wilton shall ensure that motor vehicle scrap providers are participating in the National Vehicle Switch Recovery Program (NVMSRP) by conducting a review of the End of Life Vehicle Solutions (ELVS) database to confirm that the motor vehicle scrap provider is enlisted as a participating member. Gerdau Ameristeel Wilton will conduct a semi-annual review of the ELVS database to determine whether the provider remains identified as an NVMSRP participant;
  - a. Gerdau Ameristeel Wilton may not be able to confirm that some motor vehicle scrap providers such as Brokers are enlisted as a participating member in the NVMSRP through the ELVS database. In these cases Gerdau Ameristeel Wilton will confirm that the broker is participating in the NVMSRP or another EPA-approved program by obtaining from the broker written assurance that any motor vehicle scrap provided by such broker to Gerdau Ameristeel Wilton was procured from other suppliers who are signed up for and are participating in the NVMSRP or another EPA-approved program;
  - b. Gerdau Ameristeel Wilton will require motor vehicle scrap brokers to confirm such written assurance on a semi-annual basis.
- Gerdau Ameristeel Wilton will conduct a semi-annual review the ELVS database
  to corroborate that the participant is implementing appropriate steps to minimize
  the presence of mercury in scrap from end-of-life vehicles by turning in mercury
  switches.
  - a. Some motor vehicle scrap providers participating in the NVMSRP or another EPA-approved program may not be able to demonstrate their participation in NVMSRP or another EPA-approved program to minimize the presence of mercury in the motor vehicle scrap from end-of-life vehicles by turning in mercury switches because they refuse to accept motor vehicle scrap that contains mercury switches. Examples would be a broker who purchases motor vehicle scrap from program participants, or a shredder that accepts only flattened vehicles from which the mercury switches already have been removed to the extent practicable prior to delivery to the shredder. For these motor vehicle scrap providers, Gerdau Ameristeel Wilton will obtain written assurances from the provider or obtain other means of corroboration to verify that the participant is implementing appropriate steps to minimize the

Revision Date: June 20, 2008 Page 3 of 5





presence of mercury in the scrap from end-of-life vehicles. Written assurance will be confirmed on a semi-annual basis.

3. If a motor vehicle scrap provider does not participate in or demonstrate through written assurance that it purchases motor vehicle scrap through NVMSRP or another EPA-approved program for the removal of mercury switches, Gerdau Ameristeel Wilton shall only purchase motor vehicle scrap from such provider pursuant to an EPA-approved facility-specific program for the removal of mercury switches.

#### III. Corrective Action

### A. Lead, Chlorinated Plastics, Free Organic Liquids

- If, during inspection of scrap pursuant to Part II(A) above, Gerdau Ameristeel Wilton determines that the scrap provider has not met the specifications in part I, the scrap provider will be subject to corrective action.
  - a. A nonconforming scrap load will be rejected unless contaminants causing the failure can be removed to the extent practicable. The vendor may ship Unrestricted Scrap so long as it adheres to the provisions outlined in Part II (a)(5).
  - b. After a failure to meet the scrap specifications in Part I, the scrap provider must sign a statement acknowledging the requirements of the scrap specifications and provide either certification or another comparable form of reasonable assurance that the scrap specifications will be met in the future.
  - c. If the vendor continues to fail to meet the scrap specifications, Gerdau Ameristeel Wilton will consult with the scrap provider on the cause or reasons why the scrap loads are nonconforming and will inform the scrap provider that it may be suspended for a minimum period of 30 days if the problem is not resolved.

#### B. Mercury

- 1. If, Gerdau Ameristeel Wilton reasonably believes, either as a result of inspection, site visits to a scrap yard, or review of the ELVS database or by other means, that a scrap supplier is not taking appropriate steps to minimize the presence of mercury switches in scrap from end-of-life vehicles, the facility shall:
  - a. Issue a letter to the scrap provider reiterating the requirements of the NVMSRP or another EPA-approved program and threatening suspension if the scrap provider fails to fulfill its responsibilities under the NVMSRP or another EPA-approved program.
  - b. Suspend the scrap provider if, within six months of receipt of the letter described above, the scrap provider again fails to show that it is aware of the need for and is implementing appropriate steps to minimize the presence of mercury switches in auto shred. The suspension shall only apply to shipments of motor vehicle scrap. The provider will then have to

Revision Date: June 20, 2008 Page 4 of 5





- re-qualify by demonstrating that it has cured the defect that caused the failure to meet the scrap specification.
- c. For purposes of Section III A and B, if the nonconforming scrap is purchased through a broker, Gerdau Ameristeel Wilton will require the broker to provide written assurances that the broker implemented corrective action as set forth in Section III of this plan with respect to the supplier of such non-conforming scrap.

## IV. Program Policies, Implementation Elements, and Training and Outreach Materials

- A. GA-Wilton Annual Letter to Suppliers (most recent is dated April 22, 2008)
- **B.** GA-Wilton Annual Scrap Certification Form required annually from all suppliers
- C. GA- Wilton Overall Scrap Specifications and Yard Procedures
- **D.** GA Wilton Scrap NC Policy
- **E.** ELVS Materials (available publically at http://www.eqonline.com/services/ELVS-Mercury-Switch-Recovery-Program.asp)

Revision Date: June 20, 2008







Tuesday, April 22, 2008

# Letter to all Gerdau Ameristeel Wilton Scrap Suppliers

Re: Requirements under new Area Source Rule: published Dec. 28, 2007 in 72 FR No. 248 74111-74116 to be codified under 40 CFR 63 Subpart YYYYY

Dear Scrap Supplier:

This letter is to inform you that all Gerdau Ameristeel US Steel Mills ("Gerdau Ameristeel") are subject to the new Clean Air Act Rules, 40 CFR 63 Subpart YYYYY. In addition to the current scrap specifications and prohibitions, Gerdau Ameristeel requires the following of all scrap suppliers bringing materials to Wilton:

### A. Do one (1) of three (3) by June 30, 2008

- Register, participate, and document to Gerdau Ameristeel that you are in the National Vehicle Mercury Switch Recovery Program ("NVMSRP" or "Program") or other EPA qualifying program for the removal and recovery of mercury-containing convenience light switches,
- 2. Participate in the Wilton Pay-at-the-Gate Program for mercury-containing convenience light switches. Wilton will pay \$5 for each mercury-containing convenience light switch under the following rules:
  - Remove the mercury-containing convenience light switches from end-of-life vehicles.
  - Record the VIN numbers from the end-of-life vehicles,
  - Bring the mercury switches and VIN numbers to the Wilton Shredder Scale for processing and payment.
  - We prefer that you bring only the mercury switch capsules, but will accept the switch assembly.
- 3. Certify that all scrap from your company does not contain motor vehicle scrap or mercury-containing convenience light switches.

# B. Complete the annual certification attached and send it back to Gerdau Ameristeel Wilton at the following address:

ATTN: Dawn Scoggins GERDAU AMERISTEEL P O BOX 3002 WILTON IA 52778-3002

Sincerely,

John (Jack) R. Skelley Environmental Manager

Gerdau Ameristeel Wilton

P.I.C. at it!! Prevent, Improve, & Comply

. A. Shilly for GA-WILTON





Supplier			Date			
Auditor						
			-			
Iowa Demanufacturing-Ap	pliances or	ily				
Is the facility registered with	☐ YES	□NO	□ N/A	COMMENTS:		
the Iowa DNR as a scrap						
recycler or appliance						
demanufacturer?						
Does the facility have an	□ YES	□NO	□ N/A	COMMENTS:		
approved generators number	_ 120			o o i i i i i i i i i i i i i i i i i i		
from the Iowa DNR (if	1					
applicable)?						
Is there a designated area for	☐ YES	□NO	□ N/A	COMMENTS:		
PCB storage?	1 1 1 2 3			· ·		
Do drums containing PCB's	☐ YES	□NO	□ N/A	COMMENTS:		
have EPA approved labels			1 1 1 1 1 1 1	COMMENTO.		
and contain absorbent						
material in the bottom to						
absorb any leakage?						
Are drums able to be sealed	☐ YES	□NO	□ N/A	COMMENTS:		
and covered?	L ILG		L 11/11	COMMENTO.		
Are PCB warning signs	☐ YES	□NO	□ N/A	COMMENTS:		
posted?				COMMENTS.		
Do personal have protective	□ YES	□ NO	□ N/A	COMMENTS:		
equipment on site?			11/21	COMMENTO.		
Are the pounds of capacitors	☐ YES	□ NO	□ N/A	COMMENTS:		
being removed and stored	_ 1 D3		11/21	COMMENTO.		
recorded?						
Are CFC's being removed	□ YES	□ NO	□ N/A	COMMENTS:		
from the scrap items and	- 1 20			COMMENTO.		
captured at the facility?						
Are there Freon recovery	☐ YES	□NO	□ N/A	COMMENTS:		
storage tanks for all types of	1 1 1 1 1 1			COMMENTO.		
Freon R-12 & R22 or any						
unknown type of freon?						
Is someone at the facility	☐ YES	□ NO	□ N/A	COMMENTS:		
certified for all applicable	- 120		1	COMMENTO.		
categories of freon removal						
Mvac (motor vehicle) Hvac						
type 1 and or type 2 (high		ļ				
pressure appliances)?						
Are technicians certified to	□ YES	□NO	□ N/A	COMMENTS:		
remove CFC's registered	- 123	,,				
with the EPA Region 7	1					
Office in Kansas City KS.						
(913-551-7494)?						
Is the CFC removal at the	☐ YES	□NO	□ N/A	COMMENTS:		
facility registered with the	- 123	- 1.0				
EPA Region 7 Office?	-					
Are mercury switches (if	☐ YES	□NO	□ N/A	COMMENTS:		





present) being removed from the appliances?				
Are there records for the		<del> </del>	<del>                                     </del>	
amount of PCB's, CFC's,				
and mercury switches				
removed from the facility				
and to whom?				
Are there any present	☐ YES	□NO	□ N/A	COMMENTS:
violations with the Iowa	125		L 11/21	COMMENTS.
DNR?				
CAA-Sections 608 and 609 (	CEC's)			<u> </u>
Are CFC's being removed	☐ YES	□NO	□ N/A	COMMENTS:
from the scrap items and	- 120			COMMENTS.
captured at the facility?				
Are there Freon recovery	☐ YES	□NO	□ N/A	COMMENTS:
storage tanks for all types of				
Freon R-12 & R22 or any				
unknown type of freon?				
Is someone at the facility	☐ YES	□NO	□ N/A	COMMENTS:
certified for all applicable		1		
categories of freon removal				
Mvac (motor vehicle) Hvac				
type 1 and or type 2 (high				
pressure appliances)?				
Are technicians certified to	☐ YES	□NO	□ N/A	COMMENTS:
remove CFC's registered				\
with the EPA Region 7		}		
Office in Kansas City KS.				
(913-551-7494)?				
Is the CFC removal at the	☐ YES	□ NO	□ N/A	COMMENTS:
facility registered with the				
EPA Region 7 Office?				
Are there records for the	☐ YES	□ NO	□ N/A	COMMENTS:
amount of CFC's, and				
removed from the facility				
and to whom?				
PCB's			T =	1
Are PCB capacitors being	☐ YES	□ио	□ N/A	COMMENTS:
inspected for and removed if				
found at the facility?		<del></del>		
Is there a designated area for	☐ YES	□NO	□ N/A	COMMENTS:
PCB storage?		-	<u> </u>	
Do drums containing PCB's	☐ YES	□ NO	□ N/A	COMMENTS:
have EPA approved labels				
and contain absorbent				
material in the bottom to				
absorb any leakage?	FLVEC		T > + / A	COLOUTATIO
Are drums able to be sealed	☐ YES	□ NO	□ N/A	COMMENTS:
and covered?		FINO		COLUMNITA
Are PCB warning signs	☐ YES	□NO	□ N/A	COMMENTS:





posted?				
Do personal have protective equipment on site?	☐ YES	□NO	□ N/A	COMMENTS:
Are the pounds of capacitors being removed and stored recorded?	☐ YES	□NO	□ N/A	COMMENTS:
Are there records for the amount of PCB's and Freon removed from the facility and to whom?	□ YES	□NO	□ N/A	COMMENTS:
40 CFR 63 Subpart YYYYY	(EAF Are	a Source	Rule)	
Are free organic liquids (oils, fuels, hyd. fluids, coolants, etc.) drained (depleted) to the extent practicable from scrap at the facility?	□ YES	□NO	□ N/A	COMMENTS:
Are undrained oil used filters drained (depleted) to the extent practicable at the facility?	☐ YES	□NO	□ N/A	COMMENTS:
Are mercury convenience light switches removed (depleted) to the extent practicable in end-of-life vehicles at the facility?	☐ YES	□ NO	□ N/A	COMMENTS:
Are lead containing components removed (depleted) to the extent practicable from scrap at the facility?	□ YES	□NO	□ N/A	COMMENTS:
Are mercury convenience light switches depleted to the extent practicable if found in end-of-life vehicles at the facility?	□ YES	□NO	□ N/A	COMMENTS:
Is the facility in the ELVS database and a member of the NVMSRP or other EPA approved program?	□ YES	□NO	□ N/A	COMMENTS:
Is the facility actively collecting mercury switches and participating in the NVMSRP or other EPA approved program?	□ YES	□NO	□ N/A	COMMENTS:
Does the facility have an updated list of current permits and site plans with the proper dates and numbers?	□ YES	□NO	□ N/A	COMMENTS:





Is there a general storm water permit if the facility is classified industrial?	☐ YES	□NO	□ N/A	COMMENTS:
Is the facility performing good containment practices for their fluids?	☐ YES	□NO	□ N/A	COMMENTS:
Are there records for the amount of free organic liquids, lead components, and mercury switches collected and removed from the facility and to whom?	□ YES	□NO	□ N/A	COMMENTS:
Are any follow up or corrective actions required for this facility?	□ YES	□NO	□ N/A	COMMENTS:

Revision No.: Original

Page: 1 of 5

Original Issue Date: 05-24-2009

Revision Date: new

# Gerdau Ameristeel Wilton ENVIRONMENTAL SYSTEM PROCEDURE

## Title: Shredder Fluff Control for Use as an Alternate Fuel

### 1.0 Purpose:

Ensure baseline quality and environmental suitability of shredder fluff as an alternate fuel source for cement kilns.

## 2.0 Application:

Use Shredder Fluff as a substitute for fossil fuel sources and prevent large amounts of unnecessary materials from being landfilled. This application requires the following:

2.1 The shredder fluff supplier(s) and cement kiln operator, are to have active, 3<sup>rd</sup> party audited and certified, EMS programs that would qualify for ISO 14001 certification and/or other equivalent recognized EMS certifications. (For this procedure the shredder fluff supplier is Gerdau Ameristeel Wilton (GA-Wilton) and the cement kiln operator is LaFarge NA-Davenport (LaFarge))

## 3.0 Responsibilities:

The responsible parties for this procedure are the owner/operators of the participating facilities and their authorized representatives per their EMS protocols.

### 4.0 Associated Documents

Documentation for 40 CFR 63 Subpart YYYYY compliance

• Scrap PPP and its required forms, documents, records, and reports

**ELVS** documentation

Shredder Fluff Analytical Data (PCB, Pb, Hg, Cl, etc.)

Shredder Monthly Operations Records

ESP-05.40 Records

ESP-05.40A EMS Documents and Records Register.

#### 5.0 Procedure:

- The shredder facility that supplies fluff for use as alternate fuel must comply with the "scrap provider" requirements of 40 CFR 63 Subpart YYYYY. Compliance with these requirements will insure regulated HAP's are removed or minimized to the extent practicable from being offered in fluff destined for use as alternative fuel. 40 CFR 63 Subpart YYYYY is specific to the EAF steel industry and covers the following parameters in scrap sources:
  - Lead (Pb),
  - Mercury switches (Hg),
  - Chlorinated plastics, and

Revision No.: Original

Page: 2 of 5

Original Issue Date: 05-24-2009

Revision Date: new

### • Free organic liquids

In addition, the shredder facility shall implement and maintain protocols to control the following contaminants per applicable federal and state rules:

- ➤ PCB's (Wilton, IA Shredder to accept appliances only from certified Iowa Demanufacturing Program facilities in the case of Gerdau Ameristeel)
- ➤ CFC's
- > Explosives or explosive substances
- > Radioactive Sources

### 5.1.1 Scrap Yard Inspections

- 5.1.1.1 The GA-Wilton shredder facility must maintain an internal scrap inspection program to watch for suspect items and remove potential contaminants from the incoming scrap supply. This can be separate from or in addition to federal and state required inspection programs.
  - 5.1.1.1.1 The GA-Wilton internal scrap inspection program is contained within the following documents:
    - GA Wilton Overall scrap specifications
    - GA-Wilton Scrap Annual Certification for Suppliers
    - Annual Scrap letter to suppliers
    - GA-Wilton Scrap NC policy
    - GA-Wilton Scrap PPP
    - GA Corp Scrap specifications (on Internet)
      - http://www.gerdauameristeel.com/company/sr/vendor.cfm

#### 5.2 Fluff screening (Shredder Operations)

5.2.1 Eddy Current

The GA-Wilton shredder facility must perform non-ferrous metal separation to remove as much metal from the fluff stream as possible.

- 5.2.2 Fluff Sampling and Analysis
  - 5.2.2.1 Fluff shall be sampled weekly (one composite per calendar week) using the GA-Wilton Work Instruction No. SHR-7 to collect a 5 day composite sample. The 5-day composite sample shall be considered as one (1) sample.
  - 5.2.2.2 Fluff samples shall be analyzed for the following parameters:
    - PCB's (total PCB in mg/kg), results to be reported as the total of all TSCA regulated PCB's.
    - Lead Pb; Total (mg/kg) and TCLP (mg/L),
    - Mercury –Hg; Total (mg/kg) and TCLP (mg/L),
    - Chlorine (% dry and wet wt.)
    - Alternative Fuel Analyses (specific analyses to be performed per LaFarge Cement Kiln operational requirements)

Revision No.: Original

Page: 3 of 5

Original Issue Date: 05-24-2009

Revision Date: new

### 5.2.2.3 Fluff Analytical Requirements for Laboratories

- 5.2.2.3.1 The acceptable detection limit for all PCB species analyses shall be  $\leq$  1.5ppm.
  - PCB Analysis results with detection limits over 1.5 ppm shall be either:
    - o Re-analyze fluff sample submitted to laboratory to verify detection limit,
    - O Take another subsample of original sample at Wilton, and perform another analysis to obtain an acceptable lower detection limit, or
    - o Sample results will be rejected and another entire sampling must be performed.
- 5.2.2.3.2 The laboratory shall provide the following QA with all sample results:
  - Laboratory blanks or controls
  - Laboratory Standards used
  - Spikes and recovery
  - Detection limits for all parameters analyzed

### 5.2.2.4 Fluff Analytical Results limits

- PCB's; (all analyses as dry total PCB mg/kg),
  - o Sum of all TSCA regulated PCB's < 50 ppm (mg/kg) TSCA,
  - o If PCB analyses are ND, then sum of detection limits < 50 ppm (mg/kg)-EPA R7, or
  - o If PCB analyses are a mixture of positive results and ND, then the sum of PCB results and ND limits < 50 ppm (mg/kg)-EPA R7
- Lead Pb;
  - o "as received" value ≤ 500 mg/kg LaFarge-Davenport Air Permit
  - o TCLP (mg/L) < 5.0 mg/L RCRA
- Mercury –Hg:
  - o Total alt. fuels value ≤ 1.0 mg/kg LaFarge-Davenport Air Permit
  - o TCLP (mg/L) < 0.2 mg/L RCRA
- Chlorine (% dry and wet wt.)
  - o Limits to be set per LaFarge Cement Kiln operational requirements

#### 5.2.2.5 Fluff Analytical Data Reporting

- 5.2.2.5.1 Analytical data verifying the quality and composition of the fluff used for alternative fuel shall be furnished by the shredder operations to the cement kiln operations on terms mutually acceptable to the individual companies.
- 5.2.2.5.2 The analytical data shall be kept onsite at the shredder and cement kiln operations for inspection by the regulatory agencies

No.: <u>ESP-SHRF</u>

Revision No.: Original

Page: 4 of 5

Original Issue Date: <u>05-24-2009</u> Revision Date: <u>new</u>

for verification of compliance with the applicable federal, state, and local requirements.

- 5.2.2.5.3 Iowa DNR regulations require quarterly analyses of fluff for PCB's (total) and TCLP metals (As, Ba, Cd, Cr, Pb, Hg, Se, Ag) to determine suitability for landfilling. The quarterly analysis data is to be kept at the GA-Wilton for inspection upon request by the IDNR.
- 5.2.2.6 Disposition of Fluff Not Acceptable for Use in Cement Kiln Operations
  - 5.2.2.6.1 GA-Wilton will maintain the necessary business arrangements with a Subtitle D landfill to dispose of fluff that is unsuitable for use in the cement kiln operations, but still meets the non-hazardous Subtitle D criteria.
  - 5.2.2.6.2 If sampling results (per Section 5.2.2.2) indicate non-conforming fluff composition, then the fluff generated from the time of the non-conforming sample till the next conforming sample shall be disposed of at an appropriate disposal facility. If the fluff sample results determine it to be non-hazardous, then GA-Wilton will use a Subtitle D landfill. If the fluff sample results determine it to be hazardous, then GA-Wilton will use a RCRA or a TSCA permitted facility depending on the sample results. All non-conforming fluff disposal shall conform to 40 CFR 260-265 for non-hazardous solid or RCRA hazardous waste, or 40 CFR 761 for TSCA PCB contaminated wastes as indicated by the sample results.
  - 5.2.2.6.3 LaFarge Cement Kiln Operations will be notified of all sample results and if sampling results (per Section 5.2.2.2) indicate non-conforming fluff composition.
- 5.2.3 Process measurements (Shredder operations)

The GA-Wilton shredder facility shall perform process monitoring to ensure the efficiency and effectiveness of the operations and ensure the quality of the fluff for alternative fuel. (For GA-Wilton, operational metrics are currently documented on the Shredder Monthly Operations Report to the GA-Wilton Env. Dept.)

5.2.3.1 Benefits of Process measurements (Shredder and Cement Kiln operations) GA-Wilton shall maintain shredder operational data to document the benefits of the program. GA-Wilton shall share the data with the LaFarge NA to aid in the overall project benefit(s) analysis. (The metrics and data needed to document the benefits of the fluff-for-fuel project are to be determined.)

Revision No.: Original

Page: <u>5 of 5</u>

Original Issue Date: 05-24-2009

Revision Date: new

Transportation of shredder fluff must meet all applicable USDOT regulations. Carriers must show their DOT certifications to the shredder facility prior to acceptance for hauling fluff. (The USEPA also recommends using an approved PCB hauler for the transportation of fluff.)

5.3.1 Transportation Documents

For the transportation documentation in the fluff-for-fuel project, GA-Wilton shall modify the standard Uniform Hazardous Waste Manifest for use with non-hazardous wastes. The modified manifests are currently used for the transportation documents for landfilling non-hazardous fluff. Standard Uniform Hazardous Waste Manifests shall not be used for non-hazardous loads. The monthly sample analyses shall be forwarded directly to LaFarge NA-Davenport for their alternative fuel quality records as the analyses are received by GA-Wilton. The sample results shall cover the fluff shipments from the date of the initial analyses till the next month's analyses. (see Section 5.2.2.6.2 Disposition of Fluff)

### 6.0 Records:

- 6.1 The GA-Wilton shredder facility shall keep sufficient records to document the efficiency of their operations and the quality of the fluff for alternative fuel. These records are be kept for a minimum of 3 years and are to include:
  - Production of fluff
  - Fluff shipped for use as alternative fuel
  - Fluff analytical data (to verify quality of shipped fluff)
  - Transportation manifests
  - Records of any incidents (transportation spills, failed analyses and load disposition, etc.) and corresponding corrective actions
- 6.2 The records described in Section 6.1 shall be kept per the GA-Wilton ISO 14001 EMS procedures ESP-05.40 Records and ESP-05.40A EMS Documents and Records Register.

Rev. No./Date:	Nature of Change:	
	•	
	·	

Approvals: