



## PART 70 PERMIT TO OPERATE

Under the authority of RSMo 643 and the Federal Clean Air Act the applicant is authorized to operate the air contaminant source(s) described below, in accordance with the laws, rules, and conditions set forth here in.

**Operating Permit Number:** OP2006-078  
**Expiration Date:** NOV - 6 2011  
**Installation ID:** 021-0064  
**Project Number:** 2004-12-017

**Installation Name and Address**

Silgan Containers Manufacturing Corporation  
2115 Lower Lake Road  
St. Joseph, MO 64504  
Buchanan County

**Parent Company's Name and Address**

Silgan Containers Manufacturing Corporation  
21800 Oxnard Street, Suite 600  
Woodland Hills, CA 91367

**Installation Description:**

Silgan Containers Manufacturing Corporation owns and operates a food product can manufacturing plant in St. Joseph, Buchanan County, Missouri. The five (5) major departments within the installation including draw and ironed two-piece can manufacturing, steel and aluminum draw/redraw can manufacturing, aluminum can end manufacturing, sheet coating and lithography operations and coil shearing. Manufactured products are packaged and shipped offsite to customers. The installation is a major source of volatile organic compounds (VOC).

NOV - 7 2006

Effective Date

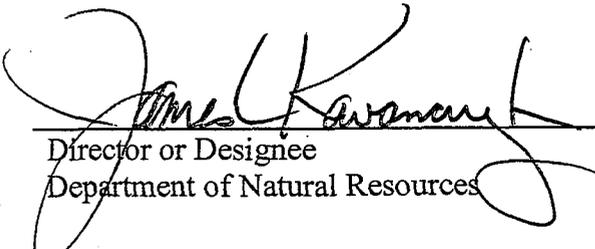
  
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Director or Designee  
Department of Natural Resources

Table of Contents

I. INSTALLATION DESCRIPTION AND EQUIPMENT LISTING .....2
INSTALLATION DESCRIPTION.....2
EMISSION UNITS WITH LIMITATIONS.....3
EMISSION UNITS WITHOUT LIMITATIONS.....4
DOCUMENTS INCORPORATED BY REFERENCE.....4
II. PLANT WIDE EMISSION LIMITATIONS .....1
Permit Condition PW001 ..... 1
10 CSR 10-6.060 ..... 1
Permit Condition PW002 ..... 1
10 CSR 10-6.065(2)(C) and 10 CSR 10-6.065(5)(A) ..... 1
III. EMISSION UNIT SPECIFIC EMISSION LIMITATIONS .....3
EU0010 through EU0030..... 3
Permit Conditions (EU0010 through EU0030)-001 ..... 3
10 CSR 10-6.220 ..... 3
Permit Conditions (EU0010 through EU0030)-002 ..... 4
10 CSR 10-6.400 ..... 4
EU0040 through EU0270 ..... 5
Permit Conditions (EU0050 through EU0110)-001 and (EU0160 through EU0230)-001 ..... 5
10 CSR 10-6.220 ..... 5
Permit Conditions EU0060-002, EU0070-002 and EU0090-002 ..... 7
10 CSR 10-6.260 ..... 7
Permit Conditions EU0060-003..... 7
10 CSR 10-6.060 ..... 7
Permit Conditions EU0120-001, EU0130-001, EU0150-001..... 8
10 CSR 10-6.060 ..... 8
Permit Conditions EU0120-002..... 8
10 CSR 10-6.060 ..... 8
Permit Conditions EU0160-002..... 9
10 CSR 10-6.060 ..... 9
Permit Conditions EU0170-002..... 9
10 CSR 10-6.060 ..... 9
Permit Conditions EU0180-002..... 9
10 CSR 10-2.040 ..... 9
Permit Conditions EU0180-003..... 10
10 CSR 10-6.260 ..... 10
IV. CORE PERMIT REQUIREMENTS .....11
V. GENERAL PERMIT REQUIREMENTS.....17
VI. ATTACHMENTS .....22
Attachment A..... 1
Attachment A1..... 2
Attachment B..... 3
Attachment C..... 4
Attachment D..... 5

## **I. Installation Description and Equipment Listing**

### **II. INSTALLATION DESCRIPTION**

Silgan Containers Manufacturing Corporation owns and operates a food product can manufacturing plant in St. Joseph, Buchanan County, Missouri. The five (5) major departments within the installation including draw and ironed (D&I) two-piece can manufacturing, steel and aluminum draw/redraw (DRD) can manufacturing, aluminum can end manufacturing, sheet coating and lithography operations and coil shearing. Manufactured products are packaged and shipped offsite to customers.

For the D&I two-piece can manufacturing, the process begins with coil steel. The material is uncoiled and lubricated before going into a cupping press where the material is stamped into a cup. The cups then go to the bodymakers, where they are ironed and drawn to the appropriate size with the aid of a lubricating solution that also acts as a coolant. Excess metal is then trimmed and the cans are washed. After washing, the cans have a washcoat enamel applied to the outside surfaces and are cured in a two-stage natural gas fired drying washcoat oven. After leaving the oven, the can is flanged, beaded to increase side strength and tested for integrity. Spray enamel is applied to the inside of the can by inside spray machines. An ink dot printer marks the can identifying which specific inside spray machines was used in the can manufacturing and the enameled can is cured in a natural gas fired inside bake oven. The finished can bodies have a printed code applied for identification using a Videojet printer and are packaged and sent to the warehouse.

For the steel and aluminum DRD can manufacturing, the process begins with pre-lubricated and pre-coated coil steel and aluminum. The material is uncoiled before going into a cupping press where the material is stamped into a cup. The can is then trimmed to remove excess metal, flanged to allow for the end to be applied, and tested for integrity. The finished can bodies have a printed code applied for identification using a Videojet printer and are packaged and sent to the warehouse.

For aluminum can end manufacturing, the process begins with pre-coated coils of aluminum. The pre-coated aluminum coils are fed into a shell press where shells are stamped and conveyed to a compound liner/applicator. The compound liner lines the shells with a compound to act as a seal for when the end is applied to the can body. A solvent mist is sprayed onto the compound liner/applicator to prevent an excessive build-up of compound. The finished ends are packaged and sent to the warehouse.

For sheet coating and lithography operations, the process begins with uncoated coil steel. The coil is cut into sheet pieces then stacked on a conveyor system that includes an automatic sheet feeder, equipped with air and vacuum. The air assists in separating the sheets while the vacuum is connected to suction cups located above the sheets that lift the top sheet and feed it into the system on each revolution of the coater roll. Coating is applied to the metal sheet by a rubber roller, which transfers the coating to the metal sheet as it passes between it and a backing roller. The sheets are cured in a curing oven heated from a heat recovery system that utilized waste heat from a recuperative thermal oxidizer. Finished sheets are stacked, bundled and sent to the warehouse. Lithography presses apply ink to pre-coated sheets with an offset-type roll applicator. The lithographic design to be printed is transferred to a master plate that is attached to a large drum (the plate cylinder). As the cylinder rotates, the plate moves first past dampener rollers, then ink rollers. The plate cylinder transfers the inked image to a rubber blanket, which transfers the image to the pre-coated sheet.

For coil shearing, the process begins with uncoated coil steel. The coil is cut into sheets and packaged and sent to the warehouse or to the sheet coating and lithography department for further processing.

The installation is a major source of volatile organic compounds (VOC). VOC and HAPs emissions are controlled by a regenerative thermal oxidizer connected to two (2) permanent total enclosures (PTEs) associated with the D&I two-piece can manufacturing inside spray machines, lithography presses, and sheet coater application rolls; and a recuperative thermal oxidizer associated with the sheet coating/lithography curing oven.

Reported Air Pollutant Emissions, tons per year							
Year	Particulate Matter ≤ Ten Microns (PM-10)	Sulfur Oxides (SO <sub>x</sub> )	Nitrogen Oxides (NO <sub>x</sub> )	Volatile Organic Compounds (VOC)	Carbon Monoxide (CO)	Lead (Pb)	Hazardous Air Pollutants (HAPs)
2000	0.87	0.06	11.48	660.81 <sup>a</sup>	9.64	-	-
2001	0.91	0.07	12.05	210.23 <sup>b</sup>	10.12	-	-
2002	0.9	0.07	11.84	231.34 <sup>c</sup>	9.94	-	-
2003	0.54	0.06	7.08	84.37 <sup>d</sup>	5.96	-	-
2004	0.66	0.05	9.25	43.75 <sup>e</sup>	7.77	-	-
2005	0.69	0.06	9.00	26.61 <sup>f</sup>	7.56	-	-

<sup>a</sup> Includes 317.22 tons of HAPs reported as VOC

<sup>b</sup> Includes 259.97 tons of HAPs reported as VOC.

<sup>c</sup> Includes 140 tons of HAPs reported as VOC.

<sup>d</sup> Includes 36.39 tons of HAPs reported as VOC.

<sup>e</sup> Includes 13.84 tons of HAPs reported as VOC.

<sup>f</sup> Includes 1.06 tons of HAPs reported as VOC.

**III.**

**IV.**

**V. EMISSION UNITS WITH LIMITATIONS**

The following list provides a description of the equipment at this installation which emit air pollutants and which are identified as having unit-specific emission limitations.

<u>Emission Unit #</u>	<u>Description of Emission Unit</u>
EU0010	Aluminum Scrap Handling System for Scrap Body Plate (ES-700)
EU0020	Steel Scrap Handling System for Scrap Body Plate (ES-701)
EU0030	Aluminum Scrap Handling System for Scrap Tab Slubs (ES-702)
EU0050	Washcoat Applicator (ES-2010)
EU0060	Regenerative Thermal Oxidizer (ES-2020)
EU0070	Inside Bake Oven (ES-2021)
EU0080	Inside Spray Machines (ES-2022)
EU0090	Washcoat Oven (ES-2023)
EU0100	D&I Line Videojet Printers (ES-2100)
EU0110	D&I Line Ink Dot Printer (ES-2200)
EU0120	Aluminum Line 1 - 209.5/307/401 (ES-3000)
EU0130	Aluminum Line 2 - 208TF (ES-3020)
EU0150	Mist Applicators for End Lines (ES-3110)
EU0160	Conversion Press (ES-3130)
EU0170	Conversion Press (ES-3140)
EU0180	Recuperative Thermal Oxidizer (ES-3300)
EU0190	Sheet Coater Line 1 (ES-3310)
EU0200	2-Press Litho Line (ES-3310)

EU0210	Sheet Coater Line 2 (ES-3320)
EU0220	4-Press Litho Line (ES-3320)
EU0230	Coating/Litho Curing Oven (ES-3320)

**VI.**

**VII. EMISSION UNITS WITHOUT LIMITATIONS**

The following list provides a description of the equipment that does not have unit specific limitations at the time of permit issuance.

Description of Emission Source

- Aluminum DRD can manufacturing cupping press, bodymakers/trimmers, flangers, testers, DRD Videojet Printer and packaging/palletizer
- D&I two-piece can manufacturing cupping press, bodymakers/trimmers, testers, beadlers, flangers, and packaging/palletizer
- Aluminum can end manufacturing scroll sheer and packaging/palletizer
- Sheet coating and lithography operations Line 2 side feeder, sheers and sheet stackers/feeders
- Coil sheering sheers and packaging/palletizer
- Parts washers
- Equipment Cleanup for D&I Line (ES-2000)
- Equipment Cleanup for End Lines (ES-3100)
- Equipment Cleanup for Coating Lines (ES-3330)
- 5,000-gallon lining compound aboveground storage tank (AST)
- 7,000-gallon washcoat AST
- 10,000-gallon inside spray storage tank

**VIII. DOCUMENTS INCORPORATED BY REFERENCE**

These documents have been incorporated by reference into this permit.

- 1) Permit to Construct #0192-010
- 2) Permit to Construct #082000-012
- 3) Permit to Construct #092002-023
- 4) Permit to Construct #122003-009
- 5) Permit to Construct #062004-015

## **II. Plant Wide Emission Limitations**

The installation shall comply with each of the following emission limitations. Consult the appropriate sections in the Code of Federal Regulations (CFR) and Code of State Regulations (CSR) for the full text of the applicable requirements.

**Permit Condition PW001**

**10 CSR 10-6.060**

**Construction Permits Required**

**Permit to Construct, Permit No. 092002-023**

**Emission Limitation:**

The permittee shall not utilize Butyl Cellosolve Acetate or Ethylene Glycol Monoethyl Ether Acetate in any process at this facility. [Special Condition #1]

**Monitoring/Recordkeeping/Reporting:**

If the permittee wishes to use these HAPs in the future, a revised modeling analysis will be required to demonstrate compliance with the Acceptable Ambient Levels (currently an annual limit of 2.0 micrograms per cubic meter ( $\mu\text{g}/\text{m}^3$ )). [Special Condition #1]

**Permit Condition PW002**

**10 CSR 10-6.065(2)(C) and 10 CSR 10-6.065(5)(A)**

**Voluntary Limitation(s)**

**Emission Limitation:**

The permittee shall not emit more than 9.9 tons of any individual hazardous air pollutant (HAP) or more than 24.9 tons of any combination of HAPs in any consecutive twelve-month period.

**Monitoring:**

The permittee shall monitor usage of all HAP-containing materials. HAP emissions shall be calculated and summarized monthly.

**Recordkeeping:**

- 1) The permittee shall maintain accurate records of the monthly and running 12-month totals of HAP emissions from this installation.
- 2) The usage of HAP containing materials shall be recorded. Attachments A and A1, or equivalents created by the permittee, must be used to certify compliance with this requirement.
- 3) The permittee shall maintain these records on-site for not less than five years and all such records shall be immediately made available to any Missouri Department of Natural Resources personnel upon request.

**Reporting:**

- 1) The permittee shall report to the Air Pollution Control Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, no later than ten days after any exceedance of any of the terms imposed by this regulation, or any malfunction which causes an exceedance of this regulation.

- 2) The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

### III. Emission Unit Specific Emission Limitations

The installation shall comply with each of the following emission limitations. Consult the appropriate sections in the Code of Federal Regulations (CFR) and Code of State Regulations (CSR) for the full text of the applicable requirements.

EU0010 through EU0030 Can Manufacturing Operations			
EU ID	EIQ Reference # (Year)	General Description (Installation Year):	Manufacturer/Model #:
EU0010	ES-700 (2003)	Aluminum Scrap Handling System for Scrap Body Plate	Ohio Blow Pipe
EU0020	ES-701 (2003)	Steel Scrap Handling System for Scrap Body Plate	Ohio Blow Pipe
EU0030	ES-702 (2003)	Aluminum Scrap Handling System for Scrap Tab Slubs	Ohio Blow Pipe

<p><b>Permit Conditions (EU0010 through EU0030)-001</b>  <b>10 CSR 10-6.220</b>  <b>Restriction of Emissions of Visible Air Contaminants</b></p>
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**Emission Limitation:**

1. No owner or other person shall cause or permit emissions to be discharged into the atmosphere from any new source any visible emissions with an opacity greater than 20%.
2. Exception: A person may discharge into the atmosphere from any source of emissions for a period(s) aggregating not more than six (6) minutes in any 60 minutes air contaminants with an opacity up to 60%.

**Monitoring:**

- 1) The permittee shall conduct opacity readings on this emission unit using the procedures contained in USEPA Test Method 22. At a minimum, the observer should be trained and knowledgeable about the effects on visibility of emissions caused by background contrast, ambient lighting, observer position relative to lighting, wind and the presence of uncombined water. Readings are only required when the emission unit is operating and when the weather conditions allow. If no visible or other significant emissions are observed using these procedures, then no further observations would be required. For emission units with visible emissions perceived or believed to exceed the applicable opacity standard, the source representative would then conduct a Method 9 observation.
- 2) The following monitoring schedule must be maintained:
  - a) Weekly observations shall be conducted for a minimum of eight consecutive weeks after permit issuance. Should no violation of this regulation be observed during this period then-
  - b) Observations must be made once every two (2) weeks for a period of eight weeks. If a violation is noted, monitoring reverts to weekly. Should no violation of this regulation be observed during this period then-
  - c) Observations must be made once per month. If a violation is noted, monitoring reverts to weekly.
- 3) If the source reverts to weekly monitoring at any time, monitoring frequency will progress in an identical manner from the initial monitoring frequency.

**Recordkeeping:**

- 1) The permittee shall maintain records of all observation results (see Attachment B), noting:
  - a) Whether any air emissions (except for water vapor) were visible from the emission units,
  - b) All emission units from which visible emissions occurred, and
  - c) Whether the visible emissions were normal for the process.
- 2) The permittee shall maintain records of any equipment malfunctions. (see Attachment C)
- 3) The permittee shall maintain records of any Method 9 test performed in accordance with this permit condition. (see Attachment D)
- 4) Attachments B, C, and D contain logs including these recordkeeping requirements. These logs, or an equivalent created by the permittee, must be used to certify compliance with this requirement.
- 5) These records shall be made available immediately for inspection to Department of Natural Resources personnel upon request.

**Reporting:**

- 1) The permittee shall report to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, no later than ten days after the permittee determined using the Method 9 test that the emission unit(s) exceeded the opacity limit.
- 2) The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions (EU0010 through EU0030)-002**

**10 CSR 10-6.400**

**Control of Emissions of Particulate Matter from Industrial Processes**

**Emission Limitation:**

- 1) The permittee shall not emit particulate matter from EU0010 and EU0030 in excess of 5.14 lb/hr combined.
- 2) The permittee shall not emit particulate matter from EU0020 in excess of 7.78 lb/hr
- 3) The permittee shall not emit particulate matter from any source in a concentration in excess of 0.30 grain per standard cubic feet of exhaust gases.

**Monitoring/Recordkeeping:**

A determination shall be made by calculation that demonstrates that EU0010, EU0020 and EU0030 operate below the allowable emission rate. A record of this determination shall be kept on site.

**Reporting:**

- 1) The permittee shall report to the Air Pollution Control Program, Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, no later than ten days after any deviation from or exceedance of any of the terms imposed by this regulation, or any malfunction which causes a deviation from or exceedance of this regulation.
- 2) The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

<b>EU0040 through EU0270</b>			
<b>Manufacturing Operations</b>			
EU ID	EIQ Reference # (Year)	General Description (Installation Year):	Manufacturer/Model #:
EU0050	ES-2010 (2003)	Washcoat Applicator (1990)	--
EU0060	ES-2020 (2003)	Regenerative Thermal Oxidizer (2000)	Smith Engineering
EU0070	ES-2021 (2003)	Inside Bake Oven (2000)	--
EU0080	ES-2022 (2003)	Inside Spray Machines (2001)	--
EU0090	ES-2023 (2003)	Washcoat Oven (2001)	--
EU0100	ES-2100 (2003)	D&I Line Videojet Printers	--
EU0110	ES-2200 (2003)	D&I Line Ink Dot Printer (1998)	--
EU0120	ES-3000 (2003)	Aluminum Line 1 - 209.5/307/401 (1992)	--
EU0130	ES-3020 (2003)	Aluminum Line 2 - 208TF (1996)	--
EU0150	ES-3110 (2003)	Mist Applicators for End Lines	--
EU0160	ES-3130 (2003)	Conversion Press (1992)	Buhrke
EU0170	ES-3140 (2003)	Conversion Press	Dayton Reliable Tool
EU0180	ES-3300 (2003)	Recuperative Thermal Oxidizer (2003)	Ross Air Systems
EU0190	ES-3310 (2003)	Sheet Coater Line 1 (1970)	Wagner
EU0200	ES-3310 (2003)	2-Press Litho Line (1970)	--
EU0210	ES-3320 (2003)	Sheet Coater Line 2 (2003)	Wagner
EU0220	ES-3320 (2003)	4-Press Litho Line (2003)	--
EU0230	ES-3320 (2003)	Coating/Litho Line Curing Oven (2003)	Feco

<p><b>Permit Conditions (EU0050 through EU0110)-001 and (EU0160 through EU0230)-001</b></p> <p><b>10 CSR 10-6.220</b></p> <p><b>Restriction of Emissions of Visible Air Contaminants</b></p>
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**Emission Limitation:**

- 1) The permittee shall not cause or permit emissions to be discharged into the atmosphere from emission units EU0050 through EU0110 and EU0160 through EU0230 any visible emissions with an opacity greater than indicated in the table below.

EU ID	EIQ Reference (2003)	Installation Date	Opacity Limit (%)
EU0050	ES-2010	1990	20%
EU0060	ES-2020	2000	20%
EU0070	ES-2021	2000	20%
EU0080	ES-2022	2001	20%
EU0090	ES-2023	2001	20%
EU0100	ES-2100	--	20%
EU0110	ES-2200	1998	20%
EU0160	ES-3130	1992	20%
EU0170	ES-3140	--	20%
EU0180	ES-3300	2003	20%
EU0190	ES-3310	1970	40%
EU0200	ES-3310	1970	40%
EU0210	ES-3320	2003	20%
EU0220	ES-3320	2003	20%
EU0230	ES-3320	2003	20%

IV.

- 2) Exception: A person may discharge into the atmosphere from any source of emissions for a period(s) aggregating not more than six (6) minutes in any 60 minutes air contaminants with an opacity up to 60%.

**Monitoring:**

- 1) The permittee shall conduct opacity readings on this emission unit using the procedures contained in USEPA Test Method 22. At a minimum, the observer should be trained and knowledgeable about the effects on visibility of emissions caused by background contrast, ambient lighting, observer position relative to lighting, wind and the presence of uncombined water. Readings are only required when the emission unit is operating and when the weather conditions allow. If no visible or other significant emissions are observed using these procedures, then no further observations would be required. For emission units with visible emissions perceived or believed to exceed the applicable opacity standard, the source representative would then conduct a Method 9 observation.
- 2) The following monitoring schedule must be maintained:
  - a) Weekly observations shall be conducted for a minimum of eight consecutive weeks after permit issuance. Should no violation of this regulation be observed during this period then-
  - b) Observations must be made once every two (2) weeks for a period of eight weeks. If a violation is noted, monitoring reverts to weekly. Should no violation of this regulation be observed during this period then-
  - c) Observations must be made once per month. If a violation is noted, monitoring reverts to weekly.
- 3) If the source reverts to weekly monitoring at any time, monitoring frequency will progress in an identical manner from the initial monitoring frequency.

**Recordkeeping:**

- 1) The permittee shall maintain records of all observation results (see Attachment B), noting:
  - a) Whether any air emissions (except for water vapor) were visible from the emission units,
  - b) All emission units from which visible emissions occurred, and
  - c) Whether the visible emissions were normal for the process.
- 2) The permittee shall maintain records of any equipment malfunctions. (see Attachment C)
- 3) The permittee shall maintain records of any Method 9 test performed in accordance with this permit condition. (see Attachment D)

- 4) Attachments B, C, and D contain logs including these recordkeeping requirements. These logs, or an equivalent created by the permittee, must be used to certify compliance with this requirement. All records must be kept for five years.
- 5) These records shall be made available immediately for inspection to Department of Natural Resources personnel upon request.

**Reporting:**

- 1) The permittee shall report to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, no later than ten days after the permittee determined using the Method 9 test that the emission unit(s) exceeded the opacity limit.
- 2) The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0060-002, EU0070-002 and EU0090-002**

**10 CSR 10-6.260**

**Restriction of Emission of Sulfur Compounds**

**Emission Limitation:**

- 1) Emissions from any existing or new source operation shall not contain more than five hundred parts per million by volume (500 ppmv) of sulfur dioxide.
- 2) Stack gasses shall not contain more than thirty-five milligrams (35 mg) per cubic meter of sulfuric acid or sulfur trioxide or any combination of those gases averaged on any consecutive three-hour time period.

**Operational Limitation/Equipment Specifications:**

The emission unit shall be limited to burning pipeline grade natural gas.

**Monitoring/Recordkeeping:**

Documentation supporting the fuel used is pipeline grade natural gas.

**Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0060-003**

**10 CSR 10-6.060**

**Construction Permits Required**

**Permit to Construct, Permit No. 082000-012**

**Emission Limitation:**

- 1) This Smith Engineering regenerative thermal oxidizer must be in use at all times when the D&I two-piece can manufacturing processes are in operation or any time that regulated VOC or HAP emissions are possible [Special Condition #1]
- 2) The Smith Engineering regenerative thermal oxidizer shall achieve a destruction removal efficiency (DRE) of VOCs and organic HAPs of at least 95%. [Special Condition #1]

**Monitoring/Recordkeeping:**

- 1) The Smith Engineering regenerative thermal oxidizer shall be operated and maintained in accordance with the manufacturer's specification. [Special Condition #1]
- 2) The operating temperature of the Smith Engineering regenerative thermal oxidizer shall be continuously monitored and recorded any time the D&I two-piece can manufacturing processes are in operation or any time that regulated VOC or HAP emissions are possible. [Special Condition #2]
- 3) The most recent 60-months or records shall be maintained on-site and shall be made available to Missouri Department of Natural Resources; personnel upon request. [Special Condition #2]

**Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0120-001, EU0130-001, EU0150-001  
10 CSR 10-6.060**

**Construction Permits Required  
Permit to Construct, Permit No. 062004-015**

**Emission Limitation:**

The permittee shall keep all end seal compounds and mister spray material in sealed containers whenever the materials are not in use. The permittee shall provide and maintain suitable, easily read, permanent markings on all end seal compound and mister spray material containers used with this equipment. [Special Condition #2]

**Monitoring/Recordkeeping/Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0120-002  
10 CSR 10-6.060**

**Construction Permits Required  
Permit to Construct, Permit No. 062004-015**

**Emission Limitation:**

The permittee shall use an end seal compound with a VOC content of less than 3.7 pounds per gallon of coating minus water in the 209.5/307/401 Aluminum End Line to achieve the Best Available Control Technology (BACT). If the permittee wishes to use any other type of end seal compound in the future on the 209.5/307/401 Aluminum End Line, the BACT analysis will need to be re-evaluated. [Special Condition #1]

**Monitoring/Recordkeeping/Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0160-002**

**10 CSR 10-6.060**

**Construction Permits Required**

**Permit to Construct, Permit No. 0192-010**

**Emission Limitation:**

The emission rate of VOC emissions from the conversion press lubricating oils shall not exceed 1.0 tons in any consecutive twelve (12) month period. [Special Condition #1]

**Monitoring/Recordkeeping:**

- 1) Monthly records shall be kept onsite at all times and shall include data for the previous 60-month period. These records shall contain the following information. [Special Condition #2]
  - a) The amount of lubricating oils used (pounds per month)
  - b) Volatile percentage of oil used
  - c) VOC emissions from the oils (pounds per month)
- 2) This information shall be made available for inspection to Department of Natural Resources' personnel upon request. [Special Condition #2]

**Monitoring/Recordkeeping/Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0170-002**

**10 CSR 10-6.060**

**Construction Permits Required**

**Permit to Construct, Permit No. 122003-009**

**Emission Limitation:**

The permittee shall keep solvents and cleaning solutions in sealed containers whenever the materials are not in use. The permittee shall provide and maintain suitable, easily read, permanent markings on all solvent and cleaning solution containers used with this equipment. [Special Condition #2]

**Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III)..

**Permit Conditions EU0180-002**

**10 CSR 10-2.040**

**Maximum Allowable Emission of Particulate Matter from Fuel Burning Equipment Used for Indirect Heating**

**Emission Limitation:**

The permittee shall not emit particulate matter in excess of 0.33 pounds per million BTU of heat input from EU0180.

**Operational Limitation/Equipment Specifications:**

This emission unit shall be limited to burning pipeline grade natural gas.

**Monitoring/Recordkeeping/Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

**Permit Conditions EU0180-003**

**10 CSR 10-6.260**

**Restriction of Emission of Sulfur Compounds**

**Emission Limitation:**

No person shall cause or allow emissions of sulfur dioxide into the atmosphere from any indirect heating source in excess of eight (8) pounds of sulfur dioxide per million BTUs actual heat input averaged on any consecutive three hour time period

**Operational Limitation/Equipment Specifications:**

The emission unit shall be limited to burning pipeline grade natural gas.

**Monitoring/Recordkeeping:**

Documentation supporting the fuel used is pipeline grade natural gas.

**Reporting:**

The permittee shall report any deviations/exceedances of this permit condition using the semi-annual monitoring report and annual compliance certification to the Air Pollution Control Program Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as required by 10 CSR 10-6.065(6)(C)1.C.(III).

## V. Core Permit Requirements

The installation shall comply with each of the following requirements. Consult the appropriate sections in the Code of Federal Regulations (CFR) and Code of State Regulations (CSR) for the full text of the applicable requirements. All citations, unless otherwise noted, are to the regulations in effect as of the date that this permit is issued.

### **10 CSR 10-6.050 Start-up, Shutdown and Malfunction Conditions**

- 1) In the event of a malfunction, which results in excess emissions that exceed one hour, the permittee shall submit to the director within two business days, in writing, the following information:
  - a) Name and location of installation;
  - b) Name and telephone number of person responsible for the installation;
  - c) Name of the person who first discovered the malfunction and precise time and date that the malfunction was discovered.
  - d) Identity of the equipment causing the excess emissions;
  - e) Time and duration of the period of excess emissions;
  - f) Cause of the excess emissions;
  - g) Air pollutants involved;
  - h) Best estimate of the magnitude of the excess emissions expressed in the units of the applicable requirement and the operating data and calculations used in estimating the magnitude;
  - i) Measures taken to mitigate the extent and duration of the excess emissions; and
  - j) Measures taken to remedy the situation that caused the excess emissions and the measures taken or planned to prevent the recurrence of these situations.
- 2) The permittee shall submit the paragraph 1 information list to the director in writing at least ten days prior to any maintenance, start-up or shutdown, which is expected to cause an excessive release of emissions that exceed one hour. If notice of the event cannot be given ten days prior to the planned occurrence, it shall be given as soon as practicable prior to the release. If an unplanned excess release of emissions exceeding one hour occurs during maintenance, start-up or shutdown, the director shall be notified verbally as soon as practical during normal working hours and no later than the close of business of the following working day. A written notice shall follow within ten working days.
- 3) Upon receipt of a notice of excess emissions issued by an agency holding a certificate of authority under section 643.140, RSMo, the permittee may provide information showing that the excess emissions were the consequence of a malfunction, start-up or shutdown. The information, at a minimum, should be the paragraph 1 list and shall be submitted not later than 15 days after receipt of the notice of excess emissions. Based upon information submitted by the permittee or any other pertinent information available, the director or the commission shall make a determination whether the excess emissions constitute a malfunction, start-up or shutdown and whether the nature, extent and duration of the excess emissions warrant enforcement action under section 643.080 or 643.151, RSMo.
- 4) Nothing in this rule shall be construed to limit the authority of the director or commission to take appropriate action, under sections 643.080, 643.090 and 643.151, RSMo to enforce the provisions of the Air Conservation Law and the corresponding rule.
- 5) Compliance with this rule does not automatically absolve the permittee of liability for the excess emissions reported.

### **10 CSR 10-6.060 Construction Permits Required**

The permittee shall not commence construction, modification, or major modification of any installation subject to this rule, begin operation after that construction, modification, or major modification, or begin operation of

any installation which has been shut down longer than five years without first obtaining a permit from the permitting authority.

**10 CSR 10-6.065 Operating Permits**

The permittee shall file a complete application for renewal of this operating permit at least six months before the date of permit expiration. In no event shall this time be greater than eighteen months. [10 CSR 10-6.065(6)(B)1.A(V)] The permittee shall retain the most current operating permit issued to this installation on-site. [10 CSR 10-6.065(6)(C)1.C(II)] The permittee shall immediately make such permit available to any Missouri Department of Natural Resources personnel upon request. [10 CSR 10-6.065(6)(C)3.B]

**10 CSR 10-6.110 Submission of Emission Data, Emission Fees and Process Information**

- 1) The permittee shall complete and submit an Emission Inventory Questionnaire (EIQ) in accordance with the requirements outlined in this rule.
- 2) The permittee shall pay an annual emission fee per ton of regulated air pollutant emitted according to the schedule in the rule. This fee is an emission fee assessed under authority of RSMo. 643.079 to satisfy the requirements of the Federal Clean Air Act, Title V.
- 3) The fees shall be due April 1 each year for emissions produced during the previous calendar year. The fees shall be payable to the Department of Natural Resources and shall be accompanied by the Emissions Inventory Questionnaire (EIQ) form or equivalent approved by the director.

**10 CSR 10-6.130 Controlling Emissions During Episodes of High Air Pollution Potential**

This rule specifies the conditions that establish an air pollution alert (yellow/orange/red/purple), or emergency (maroon) and the associated procedures and emission reduction objectives for dealing with each. The permittee shall submit an appropriate emergency plan if required by the Director.

**10 CSR 10-6.150 Circumvention**

The permittee shall not cause or permit the installation or use of any device or any other means which, without resulting in reduction in the total amount of air contaminant emitted, conceals or dilutes an emission or air contaminant which violates a rule of the Missouri Air Conservation Commission.

**10 CSR 10-6.170 Restriction of Particulate Matter to the Ambient Air Beyond the Premises of Origin**

- 1) The permittee shall not cause or allow to occur any handling, transporting or storing of any material; construction, repair, cleaning or demolition of a building or its appurtenances; construction or use of a road, driveway or open area; or operation of a commercial or industrial installation without applying reasonable measures as may be required to prevent, or in a manner which allows or may allow, fugitive particulate matter emissions to go beyond the premises of origin in quantities that the particulate matter may be found on surfaces beyond the property line of origin. The nature or origin of the particulate matter shall be determined to a reasonable degree of certainty by a technique proven to be accurate and approved by the director.
- 2) The permittee shall not cause nor allow to occur any fugitive particulate matter emissions to remain visible in the ambient air beyond the property line of origin.
- 3) Should it be determined that noncompliance has occurred, the director may require reasonable control measures as may be necessary. These measures may include, but are not limited to, the following:
  - a) Revision of procedures involving construction, repair, cleaning and demolition of buildings and their appurtenances that produce particulate matter emissions;
  - b) Paving or frequent cleaning of roads, driveways and parking lots;
  - c) Application of dust-free surfaces;

- d) Application of water; and
- e) Planting and maintenance of vegetative ground cover.

**10 CSR 10-6.180 Measurement of Emissions of Air Contaminants**

- 1) The director may require any person responsible for the source of emission of air contaminants to make or have made tests to determine the quantity or nature, or both, of emission of air contaminants from the source. The director may specify testing methods to be used in accordance with good professional practice. The director may observe the testing. All tests shall be performed by qualified personnel.
- 2) The director may conduct tests of emissions of air contaminants from any source. Upon request of the director, the person responsible for the source to be tested shall provide necessary ports in stacks or ducts and other safe and proper sampling and testing facilities, exclusive of instruments and sensing devices as may be necessary for proper determination of the emission of air contaminants.
- 3) The director shall be given a copy of the test results in writing and signed by the person responsible for the tests.

**10 CSR 10-2.100 Open Burning Restrictions**

- 1) The permittee shall not conduct, cause, permit or allow a salvage operation, the disposal of trade wastes or burning of refuse by open burning.
- 2) Exception - Open burning of trade waste or vegetation may be permitted only when it can be shown that open burning is the only feasible method of disposal or an emergency exists which requires open burning.
- 3) Any person intending to engage in open burning shall file a request to do so with the director. The request shall include the following:
  - a) The name, address and telephone number of the person submitting the application; The type of business or activity involved; A description of the proposed equipment and operating practices, the type, quantity and composition of trade wastes and expected composition and amount of air contaminants to be released to the atmosphere where known;
  - b) The schedule of burning operations;
  - c) The exact location where open burning will be used to dispose of the trade wastes;
  - d) Reasons why no method other than open burning is feasible; and
  - e) Evidence that the proposed open burning has been approved by the fire control authority which has jurisdiction.
- 4) Upon approval of the open burning permit application by the director, the person may proceed with the operation under the terms of the open burning permit. Be aware that such approval shall not exempt Silgan Containers Manufacturing Corporation from the provisions of any other law, ordinance or regulation.
- 5) The permittee shall maintain files with letters from the director approving the open burning operation and previous DNR inspection reports.

**10 CSR 10-2.070 Restriction of Emission of Odors**

No person may cause, permit or allow the emission of odorous matter in concentrations and frequencies or for durations that odor can be perceived when one volume of odorous air is diluted with seven volumes of odor-free air for two separate trials not less than 15 minutes apart within the period of one hour.

**This requirement is not federally enforceable.**

**10 CSR 10-6.100 Alternate Emission Limits**

Proposals for alternate emission limitations shall be submitted on Alternate Emission Limits Permit forms provided by the department. An installation owner or operator must obtain an Alternate Emission Limits Permit in accordance with 10 CSR 10-6.100 before alternate emission limits may become effective.

- 1) The permittee shall follow the procedures and requirements of 40 CFR Part 61, Subpart M for any activities occurring at this installation which would be subject to provisions for 40 CFR Part 61, Subpart M, National Emission Standard for Asbestos.
- 2) The permittee shall conduct monitoring to demonstrate compliance with registration, certification, notification, and Abatement Procedures and Practices standards as specified in 40 CFR Part 61, Subpart M.

**10 CSR 10-6.080 Emission Standards for Hazardous Air Pollutants and 40 CFR Part 61 Subpart M National Emission Standard for Asbestos**

- 1) The permittee shall follow the procedures and requirements of 40 CFR Part 61, Subpart M for any activities occurring at this installation which would be subject to provisions for 40 CFR Part 61, Subpart M, National Emission Standard for Asbestos.
- 2) The permittee shall conduct monitoring to demonstrate compliance with registration, certification, notification, and Abatement Procedures and Practices standards as specified in 40 CFR Part 61, Subpart M.

**10 CSR 10-6.250 Asbestos Abatement Projects – Certification, Accreditation, and Business Exemption Requirements**

The permittee shall conduct all asbestos abatement projects within the procedures established for certification and accreditation by 10 CSR 10-6.250. This rule requires individuals who work in asbestos abatement projects to be certified by the Missouri Department of Natural Resources Air Pollution Control Program. This rule requires training providers who offer training for asbestos abatement occupations to be accredited by the Missouri Department of Natural Resources Air Pollution Control Program. This rule requires persons who hold exemption status from certain requirements of this rule to allow the department to monitor training provided to employees. Each individual who works in asbestos abatement projects must first obtain certification for the appropriate occupation from the department. Each person who offers training for asbestos abatement occupations must first obtain accreditation from the department. Certain business entities that meet the requirements for state-approved exemption status must allow the department to monitor training classes provided to employees who perform asbestos abatement.

**Title VI – 40 CFR Part 82 Protection of Stratospheric Ozone**

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

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

The permittee shall be allowed to switch from any ozone-depleting substance to any alternative that is listed in the Significant New Alternatives Program (SNAP) promulgated pursuant to 40 CFR part 82, Subpart G, Significant New Alternatives Policy Program. *Federal Only - 40 CFR part 82*

**10 CSR 10-6.280 Compliance Monitoring Usage**

- 1) The permittee is not prohibited from using the following in addition to any specified compliance methods for the purpose of submission of compliance certificates:
  - a) Monitoring methods outlined in 40 CFR Part 64;
  - b) Monitoring method(s) approved for the permittee pursuant to 10 CSR 10-6.065, "Operating Permits", and incorporated into an operating permit; and
  - c) Any other monitoring methods approved by the director.
- 2) Any credible evidence may be used for the purpose of establishing whether a permittee has violated or is in violation of any such plan or other applicable requirement. Information from the use of the following methods is presumptively credible evidence of whether a violation has occurred by a permittee:
  - a) Monitoring methods outlined in 40 CFR Part 64;
  - b) A monitoring method approved for the permittee pursuant to 10 CSR 10-6.065, "Operating Permits", and incorporated into an operating permit; and
  - c) Compliance test methods specified in the rule cited as the authority for the emission limitations.
- 3) The following testing, monitoring or information gathering methods are presumptively credible testing, monitoring, or information gathering methods:
  - a) Applicable monitoring or testing methods, cited in:
    - i) 10 CSR 10-6.030, "Sampling Methods for Air Pollution Sources";
    - ii) 10 CSR 10-6.040, "Reference Methods";
    - iii) 10 CSR 10-6.070, "New Source Performance Standards";
    - iv) 10 CSR 10-6.080, "Emission Standards for Hazardous Air Pollutants"; or

- a) b) Other testing, monitoring, or information gathering methods, if approved by the director, that produce information comparable to that produced by any method listed above.

**VI.**

## VII. General Permit Requirements

The installation shall comply with each of the following requirements. Consult the appropriate sections in the Code of Federal Regulations (CFR) and Code of State Regulations (CSR) for the full text of the applicable requirements. All citations, unless otherwise noted, are to the regulations in effect as of the date that this permit is issued,

### **10 CSR 10-6.065(6)(C)1.B Permit Duration**

This permit is issued for a term of five years, commencing on the date of issuance. This permit will expire at the end of this period unless renewed.

### **10 CSR 10-6.065(6)(C)1.C General Recordkeeping and Reporting Requirements**

- 1) Recordkeeping
  - a) All required monitoring data and support information shall be retained for a period of at least five years from the date of the monitoring sample, measurement, report or application.
  - b) Copies of all current operating and construction permits issued to this installation shall be kept on-site for as long as the permits are in effect. Copies of these permits shall be made immediately available to any Missouri Department of Natural Resources' personnel upon request.
- 2) Reporting
  - a) All reports shall be submitted to the Air Pollution Control Program, Enforcement Section, P. O. Box 176, Jefferson City, MO 65102.
  - b) The permittee shall submit a report of all required monitoring by:
    - i) October 1st for monitoring which covers the January through June time period, and
    - ii) April 1st for monitoring which covers the July through December time period.
    - iii) Exception. Monitoring requirements which require reporting more frequently than semi annually shall report no later than 30 days after the end of the calendar quarter in which the measurements were taken.
  - c) Each report shall identify any deviations from emission limitations, monitoring, recordkeeping, reporting, or any other requirements of the permit, this includes deviations or Part 64 exceedances.
  - d) Submit supplemental reports as required or as needed. Supplemental reports are required no later than ten days after any exceedance of any applicable rule, regulation or other restriction. All reports of deviations shall identify the cause or probable cause of the deviations and any corrective actions or preventative measures taken.
    - i) Notice of any deviation resulting from an emergency (or upset) condition as defined in paragraph (6)(C)7.A of 10 CSR 10-6.065 (Emergency Provisions) shall be submitted to the permitting authority either verbally or in writing within two working days after the date on which the emission limitation is exceeded due to the emergency, if the permittee wishes to assert an affirmative defense. The affirmative defense of emergency shall be demonstrated through properly signed, contemporaneous operating logs, or other relevant evidence that indicate an emergency occurred and the permittee can identify the cause(s) of the emergency. The permitted installation must show that it was operated properly at the time and that during the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards or requirements in the permit. The notice must contain a description of the emergency, the steps taken to mitigate emissions, and the corrective actions taken.
    - ii) Any deviation that poses an imminent and substantial danger to public health, safety or the environment shall be reported as soon as practicable.

- iii) Any other deviations identified in the permit as requiring more frequent reporting than the permittee's semiannual report shall be reported on the schedule specified in this permit, and no later than ten days after any exceedance of any applicable rule, regulation, or other restriction.
- e) Every report submitted shall be certified by the responsible official, except that, if a report of a deviation must be submitted within ten days after the deviation, the report may be submitted without a certification if the report is resubmitted with an appropriate certification within ten days after that, together with any corrected or supplemental information required concerning the deviation.
- f) The permittee may request confidential treatment of information submitted in any report of deviation.

**10 CSR 10-6.065(6)(C)1.D Risk Management Plan Under Section 112(r)**

The permittee shall comply with the requirements of 40 CFR Part 68, Accidental Release Prevention Requirements. If the permittee has more than a threshold quantity of a regulated substance in process, as determined by 40 CFR Section 68.115, the permittee shall submit a Risk Management Plan in accordance with 40 CFR Part 68 no later than the latest of the following dates:

- 1) June 21, 1999;
- 2) Three years after the date on which a regulated substance is first listed under 40 CFR Section 68.130; or
- 3) The date on which a regulated substance is first present above a threshold quantity in a process.

**10 CSR 10-6.065(6)(C)1.E Title IV Allowances**

Not applicable.

**10 CSR 10-6.065(6)(C)1.F Severability Clause**

In the event of a successful challenge to any part of this permit, all uncontested permit conditions shall continue to be in force. All terms and conditions of this permit remain in effect pending any administrative or judicial challenge to any portion of the permit. If any provision of this permit is invalidated, the permittee shall comply with all other provisions of the permit.

**10 CSR 10-6.065(6)(C)1.G General Requirements**

- 1) The permittee must comply with all of the terms and conditions of this permit. Any noncompliance with a permit condition constitutes a violation and is grounds for enforcement action, permit termination, permit revocation and re-issuance, permit modification or denial of a permit renewal application.
- 2) The permittee may not use as a defense in an enforcement action that it would have been necessary for the permittee to halt or reduce the permitted activity in order to maintain compliance with the conditions of the permit
- 3) The permit may be modified, revoked, reopened, reissued or terminated for cause. Except as provided for minor permit modifications, the filing of an application or request for a permit modification, revocation and reissuance, or termination, or the filing of a notification of planned changes or anticipated noncompliance, does not stay any permit condition.
- 4) This permit does not convey any property rights of any sort, nor grant any exclusive privilege.
- 5) The permittee shall furnish to the Air Pollution Control Program, upon receipt of a written request and within a reasonable time, any information that the Air Pollution Control Program reasonably may require to determine whether cause exists for modifying, reopening, reissuing or revoking the permit or to determine compliance with the permit. Upon request, the permittee also shall furnish to the Air Pollution Control Program copies of records required to be kept by the permittee. The permittee may make a claim of confidentiality for any information or records submitted pursuant to 10 CSR 10-6.065(6)(C)1.

**10 CSR 10-6.065(6)(C)1.H Incentive Programs Not Requiring Permit Revisions**

No permit revision will be required for any installation changes made under any approved economic incentive, marketable permit, emissions trading, or other similar programs or processes provided for in this permit.

**10 CSR 10-6.065(6)(C)1.I Reasonably Anticipated Operating Scenarios**

None

**10 CSR 10-6.065(6)(C)1.J Emissions Trading**

None

**10 CSR 10-6.065(6)(C)3 Compliance Requirements**

- 1) Any document (including reports) required to be submitted under this permit shall contain a certification signed by the responsible official.
- 2) Upon presentation of credentials and other documents as may be required by law, the permittee shall allow authorized officials of the Missouri Department of Natural Resources, or their authorized agents, to perform the following (subject to the installation's right to seek confidential treatment of information submitted to, or obtained by, the Air Pollution Control Program):
  - a) Enter upon the premises where a permitted installation is located or an emissions-related activity is conducted, or where records must be kept under the conditions of this permit;
  - b) Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
  - c) Inspect, at reasonable times and using reasonable safety practices, any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit; and
  - d) As authorized by the Missouri Air Conservation Law, Chapter 643, RSMo or the Act, sample or monitor, at reasonable times, substances or parameters for the purpose of assuring compliance with the terms of this permit, and all applicable requirements as outlined in this permit.
- 3) All progress reports required under an applicable schedule of compliance shall be submitted semiannually (or more frequently if specified in the applicable requirement). These progress reports shall contain the following:
  - a) Dates for achieving the activities, milestones or compliance required in the schedule of compliance, and dates when these activities, milestones or compliance were achieved, and
  - b) An explanation of why any dates in the schedule of compliance were not or will not be met, and any preventative or corrective measures adopted.
- 4) The permittee shall submit an annual certification that it is in compliance with all of the federally enforceable terms and conditions contained in this permit, including emissions limitations, standards, or work practices. These certifications shall be submitted annually by April 1st, unless the applicable requirement specifies more frequent submission. These certifications shall be submitted to EPA Region VII, 901 North 5th Street, Kansas City, Kansas 66101, as well as the Air Pollution Control Program, Enforcement Section, P.O. Box 176, Jefferson City, MO 65102. All deviations and Part 64 exceedances and excursions must be included in the compliance certifications. The compliance certification shall include the following:
  - a) The identification of each term or condition of the permit that is the basis of the certification;
  - b) The current compliance status, as shown by monitoring data and other information reasonably available to the installation;
  - c) Whether compliance was continuous or intermittent;

- d) The method(s) used for determining the compliance status of the installation, both currently and over the reporting period; and
- e) Such other facts as the Air Pollution Control Program will require in order to determine the compliance status of this installation.

**10 CSR 10-6.065(6)(C)6 Permit Shield**

- 1) Compliance with the conditions of this permit shall be deemed compliance with all applicable requirements as of the date that this permit is issued, provided that:
  - a) The application requirements are included and specifically identified in this permit, or
  - b) The permitting authority, in acting on the permit revision or permit application, determines in writing that other requirements, as specifically identified in the permit, are not applicable to the installation, and this permit expressly includes that determination or a concise summary of it.
- 2) Be aware that there are exceptions to this permit protection. The permit shield does not affect the following:
  - a) The provisions of section 303 of the Act or section 643.090, RSMo concerning emergency orders,
  - b) Liability for any violation of an applicable requirement which occurred prior to, or was existing at, the time of permit issuance,
  - c) The applicable requirements of the acid rain program,
  - d) The authority of the Environmental Protection Agency and the Air Pollution Control Program of the Missouri Department of Natural Resources to obtain information, or
  - e) Any other permit or extra-permit provisions, terms or conditions expressly excluded from the permit shield provisions.

**10 CSR 10-6.065(6)(C)7 Emergency Provisions**

- 1) An emergency or upset as defined in 10 CSR 10-6.065(6)(C)7.A shall constitute an affirmative defense to an enforcement action brought for noncompliance with technology-based emissions limitations. To establish an emergency- or upset-based defense, the permittee must demonstrate, through properly signed, contemporaneous operating logs or other relevant evidence, the following:
  - a) That an emergency or upset occurred and that the permittee can identify the source of the emergency or upset,
  - b) That the installation was being operated properly,
  - c) That the permittee took all reasonable steps to minimize emissions that exceeded technology-based emissions limitations or requirements in this permit, and
  - d) That the permittee submitted notice of the emergency to the Air Pollution Control Program within two working days of the time when emission limitations were exceeded due to the emergency. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and any corrective actions taken.
- 2) Be aware that an emergency or upset shall not include noncompliance caused by improperly designed equipment, lack of preventative maintenance, careless or improper operation, or operator error.

**10 CSR 10-6.065(6)(C)8 Operational Flexibility**

An installation that has been issued a Part 70 operating permit is not required to apply for or obtain a permit revision in order to make any of the changes to the permitted installation described below if the changes are not Title I modifications, the changes do not cause emissions to exceed emissions allowable under the permit, and the changes do not result in the emission of any air contaminant not previously emitted. The permittee shall notify the Air Pollution Control Program, Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as

well as EPA Region VII, 901 North 5th Street, Kansas City, Kansas 66101, at least seven days in advance of these changes, except as allowed for emergency or upset conditions. Emissions allowable under the permit means a federally enforceable permit term or condition determined at issuance to be required by an applicable requirement that establishes an emissions limit (including a work practice standard) or a federally enforceable emissions cap that the source has assumed to avoid an applicable requirement to which the source would otherwise be subject.

- 1) Section 502(b)(10) changes. Changes that, under section 502(b)(10) of the Act, contravene an express permit term may be made without a permit revision, except for changes that would violate applicable requirements of the Act or contravene federally enforceable monitoring (including test methods), recordkeeping, reporting or compliance requirements of the permit.
  - a) Before making a change under this provision, The permittee shall provide advance written notice to the Air Pollution Control Program, Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as well as EPA Region VII, 901 North 5th Street, Kansas City, Kansas 66101, describing the changes to be made, the date on which the change will occur, and any changes in emission and any permit terms and conditions that are affected. The permittee shall maintain a copy of the notice with the permit, and the APCP shall place a copy with the permit in the public file. Written notice shall be provided to the EPA and the APCP as above at least seven days before the change is to be made. If less than seven days notice is provided because of a need to respond more quickly to these unanticipated conditions, the permittee shall provide notice to the EPA and the APCP as soon as possible after learning of the need to make the change.
  - b) The permit shield shall not apply to these changes.

**10 CSR 10-6.065(6)(C)9 Off-Permit Changes**

- 1) Except as noted below, the permittee may make any change in its permitted operations, activities or emissions that is not addressed in, constrained by or prohibited by this permit without obtaining a permit revision. Insignificant activities listed in the application, but not otherwise addressed in or prohibited by this permit, shall not be considered to be constrained by this permit for purposes of the off-permit provisions of this section. Off-permit changes shall be subject to the following requirements and restrictions:
  - a) The change must meet all applicable requirements of the Act and may not violate any existing permit term or condition; the permittee may not change a permitted installation without a permit revision if this change is subject to any requirements under Title IV of the Act or is a Title I modification;
  - b) The permittee must provide written notice of the change to the Air Pollution Control Program, Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, as well as EPA Region VII, 901 North 5th Street, Kansas City, Kansas 66101, no later than the next annual emissions report. This notice shall not be required for changes that are insignificant activities under 10 CSR 10-6.065(6)(B)3. This written notice shall describe each change, including the date, any change in emissions, pollutants emitted and any applicable requirement that would apply as a result of the change.
  - c) The permittee shall keep a record describing all changes made at the installation that result in emissions of a regulated air pollutant subject to an applicable requirement and the emissions resulting from these changes; and
  - d) The permit shield shall not apply to these changes.

**10 CSR 10-6.020(2)(R)12 Responsible Official**

The application utilized in the preparation of this permit was signed by Bill Swope, Plant Manager. If this person terminates employment, or is reassigned different duties such that a different person becomes the responsible person to represent and bind the installation in environmental permitting affairs, the owner or operator of this air contaminant source shall notify the Director of the Air Pollution Control Program of the

change. Said notification shall be in writing and shall be submitted within 30 days of the change. The notification shall include the name and title of the new person assigned by the source owner or operator to represent and bind the installation in environmental permitting affairs. All representations, agreement to terms and conditions and covenants made by the former responsible person that were used in the establishment of limiting permit conditions on this permit will continue to be binding on the installation until such time that a revision to this permit is obtained that would change said representations, agreements and covenants.

**10 CSR 10-6.065(6)(E)6 Reopening-Permit for Cause**

This permit may be reopened for cause if:

- 1) The Missouri Department of Natural Resources (MDNR) receives notice from the Environmental Protection Agency (EPA) that a petition for disapproval of a permit pursuant to 40 CFR § 70.8(d) has been granted, provided that the reopening may be stayed pending judicial review of that determination,
- 2) MDNR or EPA determines that the permit contains a material mistake or that inaccurate statements were made which resulted in establishing the emissions limitation standards or other terms of the permit,
- 3) Additional applicable requirements under the Act become applicable to the installation; however, reopening on this ground is not required if—:
  - a) The permit has a remaining term of less than three years;
  - b) The effective date of the requirement is later than the date on which the permit is due to expire; or
  - c) The additional applicable requirements are implemented in a general permit that is applicable to the installation and the installation receives authorization for coverage under that general permit,
- 4) The installation is an affected source under the acid rain program and additional requirements (including excess emissions requirements), become applicable to that source, provided that, upon approval by EPA, excess emissions offset plans shall be deemed to be incorporated into the permit; or
- 5) MDNR or EPA determines that the permit must be reopened and revised to assure compliance with applicable requirements.

**10 CSR 10-6.065(6)(E)1.C Statement of Basis**

This permit is accompanied by a statement setting forth the legal and factual basis for the draft permit conditions (including references to applicable statutory or regulatory provisions). This Statement of Basis, while referenced by the permit, is not an actual part of the permit.

## VIII. Attachments

Attachments follow.

**Silgan Containers Manufacturing Corporation**

Installation ID: 021-0064

SB - 23

Project No. 2004-12-017

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**Attachment C**  
**10 CSR 10-6.220 Compliance Demonstration**  
**Restriction of Emission of Visible Air Contaminants**

This sheet or an equivalent may be used to satisfy recordkeeping requirements for Permit Conditions (EU0010 through EU0030)-001, (EU0050 through EU0110)-002 and (EU0160 through EU0230)-002.

Method 9 Opacity Emissions Observations	
Company	Observer
Location	Observer Certification Date
Date	Emission Unit
Time	Control Device

Hour	Minute	Seconds				Steam Plume (check if applicable)		Comments
		0	15	30	45	Attached	Detached	
	0							
	1							
	2							
	3							
	4							
	5							
	6							
	7							
	8							
	9							
	10							
	11							
	12							
	13							
	14							
	15							
	16							
	17							
	18							

SUMMARY OF AVERAGE OPACITY				
Set Number	Time		Opacity	
	Start	End	Sum	Average

Readings ranged from \_\_\_\_\_ to \_\_\_\_\_ % opacity.

Was the emission unit in compliance at the time of evaluation?                       
 YES      NO      Signature of Observer





## STATEMENT OF BASIS

### Permit Reference Documents

These documents were relied upon in the preparation of the operating permit. Because they are not incorporated by reference, they are not an official part of the operating permit.

- 1) Part 70 Operating Permit (Permit Number: OP 200084), issued August 9, 2005
- 2) Part 70 Operating Permit Application, received December 6, 2004; supplemented February 14, 2005
- 3) 2003 Emissions Inventory Questionnaire, received March 26, 2004
- 4) U.S. EPA document AP-42, *Compilation of Air Pollutant Emission Factors*; Volume I, Stationary Point and Area Sources, Fifth Edition
- 5) Permit to Construct #0885-007A
- 6) Permit to Construct #1189-002
- 7) Permit to Construct #0890-007
- 8) Permit to Construct #0890-007A
- 9) Permit to Construct #062000-015

### Applicable Requirements Included in the Operating Permit but Not in the Application or Previous Operating Permits

In the operating permit application, the installation indicated they were not subject to the following regulation(s). However, in the review of the application, the agency has determined that the installation is subject to the following regulation(s) for the reasons stated.

#### 10 CSR 10-6.100, *Alternate Emission Limits*

This rule is applicable to all installations that emit volatile organic compounds (VOCs) in the ozone nonattainment areas of the state. The installation is currently in an attainment area, however, in the event that the area becomes nonattainment, this rule will become effective. The requirements of this rule have been summarized and listed in the operating permit core permit requirements.

#### 10 CSR 10-6.280, *Compliance Monitoring Usage*

This rule allows for alternative compliance certification methods by establishing a methodology for identifying acceptable testing, monitoring and/or information. The requirements of this rule have been summarized and listed in the operating permit core permit requirements.

#### Title VI – 40 CFR Part 82, *Protection of Stratospheric Ozone*

This rule applies to all installations. The requirements of this rule have been summarized and listed in the operating permit core permit requirements.

### Other Air Regulations Determined Not to Apply to the Operating Permit

The Air Pollution Control Program (APCP) has determined the following requirements to not be applicable to this installation at this time for the reasons stated.

None.

**IX.**

**X.**

**XI.**

**XII.**

**XIII.****Construction Permit Revisions**

The following revisions were made to construction permits for this installation:

- 1) Permit to Construct #0885-007A  
The permit contained no special conditions.
- 2) Permit to Construct #1189-002  
The special conditions contained in this permit limited the D&I two-can manufacturing line production rate. As of Project Number 2004-12-072, the permittee was approved to increase the D&I two-can manufacturing line production rate to 1,650 cans per minute. Due to this approved increase, none of the special conditions contained in this permit were incorporated into the Operating Permit.
- 3) Permit to Construct #0192-010  
This permit was issued for the installation of the Burke conversion press (EU0160). The special conditions of this permit are incorporated into the Operating Permit.
- 4) Permit to Construct #0890-007 and #0890-007A  
On August 14, 1990, the permittee was issued a construction permit for the installation of a three-liner gang end press (Permit to Construct #0890-007). The equipment was not installed and the permittee requested and received an amendment to the construction permit (Permit to Construct #0890-007A) on November 17, 1992. The amendment allowed the permittee to install a two-liner gang end press. By 1994, the permitted equipment had not been installed and the permit time limit had expired. None of the special conditions contained in either permit were incorporated into the Operating Permit.
- 5) Permit to Construct #062000-015  
This permit was issued for the installation of a new 208-size end line consisting of a Formatec gang press, a misting applicator, a DRT conversion press and CMB compound liner. Since emissions of VOC from the proposed equipment triggered major review, the permit to construct was reviewed under 10 CSR 10-6.060(8) and contained BACT limits for VOC. The permittee installed only the DRT conversion press and Permit to Construct #122003-009 was issued to modify Permit to Construct #062000-015 and remove associated BACT limits. Special Condition #1 in Permit to Construct #122003-009 supercedes all of the special conditions in this permit.
- 6) Permit to Construct #082000-012  
This permit was issued for the installation of a Smith Engineering regenerative thermal oxidizer, a 10,000-gallon inside spray storage tank and replacement of the D&I inside bake oven (EU0070). Special Conditions #3 through #14 requirements have been fulfilled. Special Conditions #1 and #2 of this permit are incorporated into the Operating Permit, as these conditions are operational requirements for the Smith Engineering regenerative thermal oxidizer. Of note, this permit indicated that 10 CSR 10-2.230, *Control of Emissions from Industrial Surface Coating Operations*, applied to the washcoat applicator (EU0050) and the inside spray machines (EU0080). This rule is applicable only to installations located in Clay, Jackson and Platte Counties; therefore this regulation does not apply to the installation and had not been incorporated into this operating permit.
- 7) Permit to Construct #092002-023

This permit was issued for the installation of a PTE for the two (2) existing sheet coating and lithography lines, a 75% thermal efficient Ross Air Systems recuperative thermal oxidizer, a side feeder for sheet coating line 2, and the additional of conventional inks on sheet coating line 2. According to the permit to construct, the Ross Air Systems recuperative thermal oxidizer was to replace a “Smith regenerative thermal oxidizer”, emission point EP-330A. The Ross Air Systems recuperative thermal oxidizer in fact replaced the Anguil recuperative thermal oxidizer that was originally installed for odor control. The special conditions of this permit are incorporated into the Operating Permit.

8) Permit to Construct #122003-009

This permit is a modification to Permit to Construct #062000-015 (discussed above). The special conditions of this permit are incorporated into the Operating Permit.

9) Permit to Construct #062004-015

The special conditions of this permit are incorporated into the Operating Permit.

**NSPS Applicability**

40 CFR Part 60, Subpart K, *Standards of Performance for Storage Vessels for Petroleum Liquids for Which Construction, Reconstruction, or Modification Commenced After June 11, 1973, and Prior to May 19, and* 40 CFR Part 60, Subpart Ka, *Standards of Performance for Storage Vessels for Petroleum Liquids for Which Construction, Reconstruction, or Modification Commenced After May 18, 1978, and Prior to July 23, 1984* apply to each storage vessel for petroleum liquids which has a storage capacity greater than 151,412 liters (40,000 gallons). 40 CFR Part 60, Subpart Kb, *Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984* applies to each storage vessel with a capacity greater than or equal to 75 cubic meters (m<sup>3</sup>) that is used to store volatile organic liquids (VOL) for which construction, reconstruction, or modification is commenced after July 23, 1984.

There are three (3) storage tanks located at the installation, including the 5,000-gallon above ground storage tank used for lining compound, the 7,000-gallon above ground storage tank used for washcoat operations and the 10,000-gallon storage tank used for the inside spray operations. All storage tanks are less than the respective regulation threshold; therefore, 40 CFR Part 60, Subparts K, Ka, and Kb do not apply.

**MACT Applicability**

40 CFR Part 63, Subpart KKKK, *Surface Coating of Metal Cans*

The subpart applies to metal can surfacing facilities that use 1,500 gallons per year, or more, of coatings, is located at a major source, or is part of a major source of emissions of HAPs. A major source of HAP emissions is any stationary source or group of stationary sources located within a contiguous area and under common control that emits or has the potential to emit any single HAP at a rate of 10 tons or more per year or any combination of HAP at a rate of 25 tons or more per year.

The installation has requested a federally enforceable voluntary limitation of not more than 9.9 tons/year of individual HAP and 24.9 tons/year of any combination of HAPs. Therefore, this installation will not be considered a major source of HAPs, and this regulation does not apply.

**NESHAP Applicability**

40 CFR Part 61, Subpart M, *National Emission Standards for Asbestos*

This requirement applies to all sources due to the possibility of renovation or demolition at any installation. The requirements of this rule have been summarized and listed in the operating permit under core permit requirements.

**CAM Applicability**

40 CFR Part 64, *Compliance Assurance Monitoring (CAM)*

The CAM rule applies to each pollutant specific emission unit that meets all of the following:

- Be subject to an emission limitation or standard, and
- Use a control device to achieve compliance, and
- Have pre-control emissions that exceed or are equivalent to the major source threshold.

There are twenty-seven (27) *Emission Units with Limitations* at the installation. These units include the following:

EU ID	Description	Installation Year
EU0010	Aluminum Scrap Handling System for Scrap Body Plate	--
EU0020	Steel Scrap Handling System for Scrap Body Plate	--
EU0030	Aluminum Scrap Handling System for Scrap Tab Slubs	--
EU0050	Washcoat Applicator	1990
EU0060	Regenerative Thermal Oxidizer	2000
EU0070	Inside Bake Oven	2000
EU0080	Inside Spray Machines	2001
EU0090	Washcoat Oven	2001
EU0100	D&I Line Videojet Printers	--
EU0110	D&I Line Ink Dot Printer	1998
EU0120	Aluminum Line 1 - 209.5/307/401	1992
EU0130	Aluminum Line 2 - 208TF	1996
EU0150	Mist Applicators for End Lines	--
EU0160	Conversion Press	1992
EU0170	Conversion Press	--
EU0180	Recuperative Thermal Oxidizer	2003
EU0190	Sheet Coater Line 1	1970
EU0200	2-Press Litho Line	1970
EU0210	Sheet Coater Line 2	2003
EU0220	4-Press Litho Line	2003
EU0230	Coating/Litho Line Curing Oven	2003

Of the above listed *Emission Units with Limitations*, all of the emission units do not use a control device to achieve compliance with any emission limitation or standard, with the exception of the following:

EU ID	Description	Installation Year	Pollutant Control Mechanism	Criteria Pollutant Controlled
EU0050	Washcoat Applicator	1990	Smith Regenerative TO	VOC and HAPs
EU0080	Inside Spray Machines	1990	Smith Regenerative TO	VOC and HAPs
EU0190	Sheet Coater Line 1	1970	Smith Regenerative TO	VOC and HAPs
EU0200	2-Press Litho Line	1970	Smith Regenerative TO	VOC and HAPs
EU0210	Sheet Coater Line 2	2003	Smith Regenerative TO	VOC and HAPs
EU0220	4-Press Litho Line	2003	Smith Regenerative TO	VOC and HAPs

The following emission units are equipped with the control device as required in Permit to Construct #082000-012. The pre-control device emissions from EU0190 through EU0220 exceed the major source threshold for VOC (100 tons/yr). The HAP emissions are controlled by the voluntary operating permit limitation, PW001 to less than major source levels. Emission units EU0050 and EU0080 do not independently meet the third CAM requirement, in which they must have pre-control emissions that exceed or are equivalent to the major source threshold. The delisting of EGBE from the EPA list of HAPs (Federal Register Vol.69 No.228, Nov.29, 2004) reduced HAP emissions at the facility significantly and reduced HAP emissions from EU0050 and EU0080 below major source levels. Below is a summary of potential VOC based on maximum design rates contained in the 2003 EIQ.

Col 1	Column 2	Col 3	Col 4	Column 5
EU ID	Description	Max Design Rate (tons/hr)	VOC Emission Factor (lb/ton)	Pre-control VOC Emissions (tons/yr)
EU0050	Washcoat Applicator	0.032	330	46.25
EU0080	Inside Spray Machines	0.05	238	52.12
EU0190 EU0200	Sheet Coater Line 1 and 2-Press Litho Line	0.11	1096 (Material 9469015)	635
EU0210 EU0220	Sheet Coater Line 2 and 4-Press Litho Line	0.11	1096 (Material 9469015)	635

Column 3 = 2003 EIQ Maximum Design Rate

Column 4= [ (Percent VOC in Material) x (Material Density) ] / (Material Density) x (2,000 lb/ton)

Column 5 = Column 3 x 8760 hr/yr x Column 4 / 2,000 lb/ton

Based on the above calculations, EU0190 through EU0220 meet the CAM applicability requirements. However, Construction Permit 082000-012, requires continuous monitoring of the combustion temperature of the Smith Oxidizer. Since the Smith Oxidizer is already required to be continuously monitored based on the combustion temperature, CAM does not apply.

**Other Regulatory Determinations**

A) *10 CSR 10-2.040, Maximum Allowable Emissions of Particulate Matter From Fuel Burning Equipment Used for Indirect Heating:*

This rule applies to installations in which fuel is burned for the primary purpose of producing steam, hot water or hot air or other indirect heating of liquids, gases or solids and in the course of doing so, the products of combustion do not come into contact with process material. For the purpose of this rule, the heat input is the aggregate heat content of all fuels whose product of combustion pass through a stack(s). The total heat input of all fuel burning units at the installation are used for determining the maximum allowable amount of particulate matter which may be emitted. This rule establishes new sources to be those units built after 2/15/1979. PM emissions from new sources with heat input rates less than ten (10) MMBtu/hr is limited to 0.40 pounds per MMBtu/hr. PM emissions from new sources with heat input rates equal to or greater than ten (10) MMBtu/hr and less than or equal to five thousand (5,000) MMBtu/hr are determined according to the equation  $E = 0.8(Q)^{-0.301}$ ; where E is the maximum allowable particulate emission rate in pounds per MMBtu rounded to two decimal places and Q is the installation heat input in MMBtu/hr.

The installation heat input (Q) is:

EU ID	EQ Reference # (2004)	Emission Unit Description	Q (MMBtu/hr)
EU0060	ES-2020	Smith Regenerative Thermal Oxidizer for D&I Line	5
EU0180	ES-3300	Ross Air Systems Recuperative Thermal Oxidizer for Sheet Coating Lines	13.5
Sum of Installation Heat Input (Q)			18.5

The maximum emission rate for the Ross Air Systems Recuperative Thermal Oxidizer for Sheet Coating Lines (EU190) is calculated as follows:

$$E = 0.80 \times (18.5 \text{ MMBtu/hr})^{-0.301}$$

$$E = 0.33 \text{ lb/MMBtu}$$

The following table presents the data and calculations used to demonstrate compliance with this rule:

Column 1	Column 2	Column 3	Column 4	Column 5	Column 6	Column 7
EU ID	Maximum Hourly Design Rate	Emission Factor	Emission Rate (lb/hr)	Heat Input (MMBtu/hr)	Emission Rate (lb/MMBtu)	In Compliance
EU0060	0.005 MMCF/hr	7.6 lb/MMCF	0.04	5	0.008	Yes
EU0180	0.013 MMCF/hr	7.6 lb/MMCF	0.10	13.5	0.007	Yes

Column 1 = Emission Unit ID listed in permit.

Column 2 = Maximum heat input of emission unit in Btu/hr divided by the heat content of fuel Btu/MMCF for natural gas.

Column 3 = Emission factor for that emission unit taken from AP-42.

Column 4 = Column 2 x Column 3

Column 5 = Maximum heat input rate of emission unit

Column 6 = Column 4 / Column 5. The value in this column demonstrates each source will comply with the calculated maximum allowable particulate matter emission rate.

Column 7 = If Column 4 < Column 6, then "Yes".

**B) 10 CSR 10-6.220, *Restriction of Emission of Visible Air Contaminants:***

10 CSR 10-6.220 applies to all sources of visible emissions at the installation; however, this rule does not apply to fugitive emissions. All sources this rule applies to are new sources, i.e. they were installed on or after to 2/24/1971; except for the sheet coater line (EU0190) and the 2-press litho line (EU0200), which were installed in 1970.

**C) 10 CSR 10-6.260, *Restriction of Emission of Sulfur Compounds:***

10 CSR 10-6.260 applies to sources of sulfur emissions at the installation that are both direct and indirect heating sources. The emission sources at the installation regulated by this rule include the natural gas fired Smith Engineering regenerative thermal oxidizer (EU0060), the inside bake oven (EU0070), the washcoat ovens (EU0090) and the Ross Air Systems recuperative thermal oxidizer (EU0180). Compliance with this rule is assumed in Permit Conditions EU0060-004, EU0070-003, EU0090-003 and EU0180-004, by limiting the source to burn only pipeline grade natural gas.

The exemption for natural gas combustion in the current version (May 30, 2004, effective date) of this rule has not been incorporated into the federal State Implementation Plan (SIP). Therefore, the old version of the

rule that does not contain an exemption for natural gas combustion is still enforceable until the new version of the sulfur rule is adopted in the federal SIP

- D) 10 CSR 10-6.400, *Restriction of Emissions of Particulate Matter from Industrial Processes*:  
 10.2.030, *Restriction of Emission of Particulate Matter from Industrial Processes* was rescinded March 30, 2001 and replaced by 10 CSR 10-6.400. 10 CSR 10-6.400 applies to any operation, process or activity that emits particulate matter (PM). 10 CSR 10-6.400(3)(A)1. PM emissions may not in any one hour exceed the emission rate calculated by the following equation for process rates (P) of 60,000 pounds per hour or less:

$$\text{Maximum allowable emission rate (E)} = 4.1(P)^{0.67}$$

Where: E = rate of emission in pounds per hour

P = process weight in tons per hour

1. Aluminum Scrap Handling System (EU0010 and EU0030)

The allowable PM emission rate per hour for the Aluminum Scrap Handling System (EU0010 and EU0030) was calculated using a process weight of 1.403 tons/hr. The maximum allowable emission rate (E) =  $4.1(1.403)^{0.67}$ , or 5.14 lbs/hr combined total for the two emission units.

The actual uncontrolled emissions from this emission unit is calculated as follows:

$$E_{\text{actual}} = (8,418.1 \text{ tons Aluminum/yr}) \times (12 \text{ lb scrap} / 100 \text{ lb metal processed}) \times (0.01 \text{ lb PM} / 100 \text{ lb conveyed}) \times (2000 \text{ lbs/ton})$$

$$E_{\text{actual}} = 202 \text{ lbs/yr, or } 0.02 \text{ lbs/hr.}$$

This uncontrolled emission rate is below the emission limit for this unit, therefore an exceedance of the emission limit is not expected and monitoring is not considered necessary.

2. Steel Scrap Handling System (EU0020)

The allowable PM emission rate per hour for the Steel Scrap Handling System (EU0020) was calculated using a process weight of 2.6 tons/hr. The maximum allowable emission rate (E) =  $4.1(2.6)^{0.67}$ , or 7.78 lbs/hr.

The actual uncontrolled emissions from this emission unit is calculated as follows:

$$E_{\text{actual}} = (15,604.9 \text{ tons steel/yr}) \times (12 \text{ lb scrap} / 100 \text{ lb metal processed}) \times (0.01 \text{ lb PM} / 100 \text{ lb conveyed}) \times (2000 \text{ lbs/ton})$$

$$E_{\text{actual}} = 375 \text{ lbs/yr, or } 0.04 \text{ lbs/hr.}$$

This uncontrolled emission rate is below the emission limit for this unit, therefore an exceedance of the emission limit is not expected and monitoring is not considered necessary.

Emission units determined not to be subject to this rule are listed below. The emission factors are based on the materials used at the installation as presented in the 2003 EIQ.

1. 10 CSR 10-6.400(1)(B)(6), The burning of fuel for indirect heating. This rule is not applicable to the following equipment:  
 EU0180 – Ross Air Systems Recuperative Thermal Oxidizer, 13.5 MMBtu/hr (ES-3300)
2. 10 CSR 10-6.400(1)(B)(6), Emission units that at maximum design capacity have a potential to emit less than 0.5 lbs/hr particulate matter. This rule is not applicable to the following equipment:

EU0040 – Equipment Cleanup for D&I Line (ES-2000)

EU0140 – Equipment Cleanup for Can End Lines (ES-3100)

EU0150 – Mist Applicators for Can End Lines (ES-3110)

EU0240 – Equipment Cleanup for Coating Lines (ES-3330)

Material contains no solids; therefore there are no PM emissions from these units.

EU0050 – Washcoat Applicator (ES-2010)

Maximum Design Rate = 0.032 tons/hr

PM (Solids) Percentage in Coating = 34.6% by weight of solids

Coating Density = 8.75 lb/gal

PM Emission Factor = 692 lbs/ton

Transfer Efficiency = 94%

Fallout Fraction = 98.5%

Maximum Uncontrolled PM Emissions = 0.02 lb/hr

EU0060 – Smith Engineering Regenerative Thermal Oxidizer (ES-2020)

Maximum Design Rate = 5 MMBtu/hr or 0.005 MMCF/hr

PM Emission Factor = 7.6 lbs/MMCF

Maximum PM Emissions = 0.038 lb/hr

EU0070 – Inside Bake Oven (ES-2021)

Maximum Design Rate = 4.3 MMBtu/hr or 0.004 MMCF/hr

PM Emission Factor = 7.6 lbs/MMCF

Maximum PM Emissions = 0.030 lb/hr

EU0080 – Inside Spray Machine (ES-2022)

Maximum Design Rate = 0.05 tons/hr

PM (Solids) Percentage in Coating = 28.8% by weight of solids

Coating Density = 8.9 lb/gal

PM Emission Factor = 576 lbs/ton

Transfer Efficiency = 94%

Fallout Fraction = 98.5%

Maximum Uncontrolled PM Emissions = 0.03 lb/hr

EU0090 – Washcoat Oven (ES-2023)

Maximum Design Rate = 7.2 MMBtu/hr or 0.007 MMCF/hr

PM Emission Factor = 7.6 lbs/MMCF

Maximum PM Emissions = 0.053 lb/hr

EU0100 – D&I Line Videojet Printer (ES-2100)

Maximum Design Rate = 0.0003 tons/hr

PM (Solids) Percentage = 22% by weight of solids

Coating Density = 7.42 lb/gal

PM Emission Factor = 440 lbs/ton

Maximum Uncontrolled PM Emissions = 0.13 lb/hr

EU0110 – D&I Line Ink Dot Printer (ES-2200)

Maximum Design Rate = 0.0003 tons/hr  
PM (Solids) Percentage = 7% by weight of solids  
Coating Density = 7.33 lb/gal  
PM Emission Factor = 140 lbs/ton  
Maximum Uncontrolled PM Emissions = 0.04 lb/hr

**EU0160 – Burke Conversion Press (ES-3130)**

Maximum Design Rate = 0.0003 tons/hr  
PM (Solids) Percentage = 18% by weight of solids  
Coating Density = 6.36 lb/gal  
PM Emission Factor = 360 lbs/ton  
Maximum Uncontrolled PM Emissions = 0.29 lb/hr

**EU0170 – DRT Conversion Press (ES-3140)**

Maximum Design Rate = 0.0003 tons/hr  
PM (Solids) Percentage = 18% by weight of solids  
Coating Density = 6.36 lb/gal  
PM Emission Factor = 360 lbs/ton  
Maximum Uncontrolled PM Emissions = 0.29 lb/hr

**DRD Videojet Printer (ES-3200)**

Maximum Design Rate = 0.0003 tons/hr  
PM (Solids) Percentage = 22% by weight of solids  
Coating Density = 7.42 lb/gal  
PM Emission Factor = 440 lbs/ton  
Maximum Uncontrolled PM Emissions = 0.13 lb/hr

Other rule applicability determinations made include the following:

- 1) The aluminum can end manufacturing compound used at the installation is applied to the can ends through a liquid flow coating process; therefore PM would be suspended during the application process. Emissions from Aluminum Line 1 – 209.5/307/401 (EU0120) and Aluminum Line 2 – 208TF (EU0130) are VOC and HAPs only.
- 2) The previous Operating Permit OP200084 calculated PM emissions from the Inside Spray Machine (EU0080) with a maximum design rate of 0.05 tons per hour. Based on the Inside Spray Machine completely enclosed within a PTE, PM emissions are exhausted through a thermal oxidizer. Additionally, sheet coater line 1 (EU0190), 2-press litho line (EU0200), sheet coater line 2 (EU0210), and 4-press litho line (EU0220) are completely enclosed within a PTE with PM emissions also exhausted through a thermal oxidizer. Exhausted emissions are limited by 10 CSR 10-2.040, *Maximum Allowable Emission of Particulate Matter from Fuel Burning Equipment Used for Indirect Heating* since the emissions are vented through the Smith Engineering regenerative thermal oxidizer (EU0060); therefore this rule was determined not to apply to these emission units.
- 3) Emission Unit Numbering  
When this Operating Permit was drafted, 40 CFR part 63 Subpart KKKK was included as a permit condition. This regulation affected the manufacturing operations as well as the cleanup operations. With the voluntary HAP limitation, this installation is no longer subject to KKKK, and the following

emission units have been moved from Emission Units with Limitations to Emission Units without Limitations:

EU0040, Equipment Cleanup for D & I Line

EU0140, Equipment Cleanup for End Lines

EU0240, Equipment Cleanup for Coating Lines

EU0250, 5,000 gallon lining compound AST

EU0260, 7,000 gallon washcoat AST

EU0270, 10,000 gallon inside spray coating storage tank

4) 10 CSR 10-2.215, *Control of Emissions from Solvent Cleanup Operations*

This regulation applies only in Clay, Jackson, and Platte counties. This installation is located in Buchanan county, therefore this regulation does not apply.

**Other Regulations Not Cited in the Operating Permit or the Above Statement of Basis**

Any regulation which is not specifically listed in either the Operating Permit or in the above Statement of Basis does not appear, based on this review, to be an applicable requirement for this installation for one or more of the following reasons:

1. The specific pollutant regulated by that rule is not emitted by the installation;
2. The installation is not in the source category regulated by that rule;
3. The installation is not in the county or specific area that is regulated under the authority of that rule;
4. The installation does not contain the type of emission unit which is regulated by that rule;
5. The rule is only for administrative purposes.

Should a later determination conclude that the installation is subject to one or more of the regulations cited in this Statement of Basis or other regulations which were not cited, the installation shall determine and demonstrate, to the APCP's satisfaction, the installation's compliance with that regulation(s). If the installation is not in compliance with a regulation which was not previously cited, the installation shall submit to the APCP a schedule for achieving compliance for that regulation(s).

Prepared by:

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Nicole Voyles  
Environmental Engineer