PERMIT BOOK

STATE OF MISSOURI

DEPARTMENT OF NATURAL RESOURCES

MISSOURI AIR CONSERVATION COMMISSION

PERMIT TO CONSTRUCT

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

Permit Number: 072012-009

Project Number: 2012-03-006
Installation Number: 047-0178

Parent Company: Holland 1916

Parent Company Address: 1340 N. Burlington Street, North Kansas City, MO 64116

Installation Name: Holland 1916

Installation Address: 1340 N. Burlington Street, North Kansas City, MO 64116

Location Information: Clay County, S23, T50N, R33W

Application for Authority to Construct was made for:
The installation of a new paint booth. This review was conducted in accordance with Section (5), Missouri State Rule 10 CSR 10-6.060, *Construction Permits Required.*

☐ Standard Conditions (on reverse) are applicable to this permit.

☑ Standard Conditions (on reverse) and Special Conditions are applicable to this permit.

JUL 23 2012
EFFECTIVE DATE

Wendy Vit for Kyra L. Moore
DIRECTOR OR DESIGNEE
DEPARTMENT OF NATURAL RESOURCES

STANDARD CONDITIONS:

Permission to construct may be revoked if you fail to begin construction or modification within two years from the effective date of this permit. Permittee should notify the Air Pollution Control Program if construction or modification is not started within two years after the effective date of this permit, or if construction or modification is suspended for one year or more.

You will be in violation of 10 CSR 10-6.060 if you fail to adhere to the specifications and conditions listed in your application, this permit and the project review. In the event that there is a discrepancy between the permit application and this permit, the conditions of this permit shall take precedence. Specifically, all air contaminant control devices shall be operated and maintained as specified in the application, associated plans and specifications.

You must notify the Department's Air Pollution Control Program of the anticipated date of startup of these air contaminant sources. The information must be made available within 30 days of actual startup. Also, you must notify the Department of Natural Resources Regional office responsible for the area within which you are located within 15 days after the actual startup of these air contaminant sources.

A copy of this permit and permit review shall be kept at the installation address and shall be made available to Department of Natural Resources' personnel upon request.

You may appeal this permit or any of the listed special conditions to the Administrative Hearing Commission (AHC), P.O. Box 1557, Jefferson City, MO 65102, as provided in RSMo 643.075.6 and 621.250.3. If you choose to appeal, you must file a petition with the AHC within 30 days after the date this decision was mailed or the date it was delivered, whichever date was earlier. If any such petition is sent by registered mail or certified mail, it will be deemed filed on the date it is mailed. If it is sent by any method other than registered mail or certified mail, it will be deemed filed on the date it is received by the AHC.

If you choose not to appeal, this certificate, the project review and your application and associated correspondence constitutes your permit to construct. The permit allows you to construct and operate your air contaminant sources(s), but in no way relieves you of your obligation to comply with all applicable provisions of the Missouri Air Conservation Law, regulations of the Missouri Department of Natural Resources and other applicable federal, state and local laws and ordinances.

The Air Pollution Control Program invites your questions regarding this air pollution permit. Please contact the Construction Permit Unit at (573) 751-4817. If you prefer to write, please address your correspondence to the Missouri Department of Natural Resources, Air Pollution Control Program, P.O. Box 176, Jefferson City, MO 65102-0176, attention: Construction Permit Unit.

SPECIAL CONDITIONS:

The permittee is authorized to construct and operate subject to the following special conditions:

The special conditions listed in this permit were included based on the authority granted the Missouri Air Pollution Control Program by the Missouri Air Conservation Law (specifically 643.075) and by the Missouri Rules listed in Title 10, Division 10 of the Code of State Regulations (specifically 10 CSR 10-6.060). For specific details regarding conditions, see 10 CSR 10-6.060 paragraph (12)(A)10. "Conditions required by permitting authority."

Holland 1916
Clay County, S23, T50N, R33W

1. Superseding Condition
   A. The conditions of this permit supersede all special conditions found in the previously issued Construction Permit 102002-007 issued by the Air Pollution Control Program.

2. Volatile Organic Compounds (VOC) and Hazardous Air Pollutants (HAPs) Emission Limitations
   A. Holland 1916 shall emit less than 40.0 tons of VOCs in any consecutive 12-month period from the entire installation (see Table 1).

   B. Holland 1916 shall emit less than ten (10.0) tons individually of Hazardous Air Pollutants (HAPs) in any consecutive 12-month period from the entire installation (see Table 1).

   C. Holland 1916 shall emit less than five (5.0) tons of Glycol Ether in any consecutive 12-month period from the entire installation (see Table 1).

   D. Holland 1916 shall emit less than twenty-five (25.0) tons combined of Hazardous Air Pollutants (HAPs) in any consecutive 12-month period from the entire installation (see Table 1).

Table 1: All Emission Points Reported at Holland 1916

Emission Point Number:	Description:
EP-01	Natural Gas Curing Oven
EP-02	Metal Solvent Cleaning
EP-03	No Longer Designated to an Emission Unit
EP-04	Existing Paint Booth
EP-05	New Paint Booth

   E. Attachment A, Attachment B and Attachment C or equivalent forms, such as electronic forms, approved by the Air Pollution Control Program shall be used to demonstrate compliance with Special Conditions 2.A, 2.B, and 2.C.

SPECIAL CONDITIONS:

The permittee is authorized to construct and operate subject to the following special conditions:

3. Control Device Requirement – Particulate Filter
   A. Holland 1916 shall control particulate matter emissions from their paint booths (EP-04 and EP-05) using particulate filters as specified in the permit application. The filter(s) shall be operated and maintained in accordance with the manufacturer's specifications.

   B. Replacement particulate filters for the paint booths shall be kept on hand at all times. The particulate filters shall be made of fibers appropriate for operating conditions expected to occur (i.e. temperature limits, acidic and alkali resistance, and abrasion resistance).

   C. Holland 1916 shall maintain an operating and maintenance log for the filters which shall include the following:
      1) Incidents of malfunction, with impact on emissions, duration of event, probable cause, and corrective actions; and
      2) Maintenance activities, with inspection schedule, repair actions, and replacements, etc.

4. Operational Requirement - Solvent
   A. Holland 1916 shall keep the solvents and cleaning solutions in sealed containers whenever the materials are not in use. Holland 1916 shall provide and maintain suitable, easily read, permanent markings on all solvent and cleaning solution containers used with this equipment.

5. Operational Requirement – Spray Gun
   Holland 1916 shall only operate one spray gun in paint booth EP-05 with a maximum hourly application rate of eight (8) gallons per hour.

6. Use of Alternative Coating in the Spray Painting Booth
   A. When considering using an alternative coating at your facility that is different than a material listed in the Application for Authority to Construct, Holland 1916 shall calculate the potential emissions of all individual HAP in the alternative material.

   B. Holland 1916 shall seek approval from the Air Pollution Control Program before use of the alternative material if the potential individual HAP emissions for the alternative material are equal to or greater than the screening model action level (SMAL) for any chemical listed in Appendix A.

SPECIAL CONDITIONS:

The permittee is authorized to construct and operate subject to the following special conditions:

C. Attachment D or equivalent forms, such as electronic forms, approved by the Air Pollution Control Program shall be used to show compliance with Special Condition 6.A.

7. Record Keeping and Reporting Requirements

A. Holland 1916 shall maintain all records required by this permit for not less than five years and shall make them available immediately to any Missouri Department of Natural Resources' personnel upon request. These records shall include Material Safety Data Sheets (MSDS) for all materials used.

B. Holland 1916 shall report to the Air Pollution Control Program's Compliance/Enforcement Section, P.O. Box 176, Jefferson City, MO 65102, no later than ten days after the end of the month during which any record required by this permit show an exceedance of a limitation imposed by this permit.

REVIEW OF APPLICATION FOR AUTHORITY TO CONSTRUCT AND OPERATE
SECTION (5) REVIEW
Project Number: 2012-03-006
Installation ID Number: 047-0178
Permit Number:

Holland 1916 Complete: March 1, 2012
1340 N. Burlington Street
North Kansas City, MO 64116

Parent Company:
Holland 1916
1340 N. Burlington Street
North Kansas City, MO 64116

Clay County, S23, T50N, R33W

REVIEW SUMMARY

- Holland 1916 has applied for authority to install a new paint booth.

- Hazardous Air Pollutant (HAP) emissions are expected from the proposed equipment. HAPs of concern from this process are Xylene in the forms of Xylol and Dimethylbenzene (CAS# 95-47-6 and 1330-20-7), Cumene (CAS# 98-82-8), Ethyl Benzene (CAS# 100-41-4), and Toluene (CAS# 108-88-3).

- None of the New Source Performance Standards (NSPS) apply to the installation.

- 40 CFR 63 Subpart XXXXXX, *National Emission Standards for Hazardous Air Pollutants Area Source Standards for Nine Metal Fabrication and Finishing Source Categories* does not apply to this installation as they do not emit any of target HAPs listed in this subpart. Subpart MMMM *National Emission Standards for Hazardous Air Pollutants for Surface Coating of Miscellaneous Metal Parts and Products,* does not apply because the installation is not a major source of HAPs.

- Panel filters are being used to control the particulate matter (PM), particulate matter less than ten microns in aerodynamic diameter (PM_{10}), and particulate matter less than 2.5 microns in aerodynamic diameter ($PM_{2.5}$) emissions from the equipment in this permit.

- This review was conducted in accordance with Section (5) of Missouri State Rule 10 CSR 10-6.060, *Construction Permits Required*. Potential emissions of Volatile Organic Compounds (VOC) and HAPs are conditioned below de minimis levels.

- This installation is located in Clay County, a maintenance area for ozone and an attainment area for all other criteria pollutants.

- This installation is not on the List of Named Installations found in 10 CSR 10-6.020(3)(B), Table 2. The installation's major source level is 250 tons per year and fugitive emissions are not counted toward major source applicability.
- Ambient air quality modeling was not performed since potential emissions of the application are below de minimis levels.
- Emissions testing is not required for the equipment.
- No Operating Permit is required for this installation.
- Approval of this permit is recommended with special conditions.

INSTALLATION DESCRIPTION

Holland 1916 produces metal nameplates and control panels for industrial application. This installation is located at 1340 N. Burlington Street in North Kansas City, Missouri. Holland 1916 has requested to be conditioned to de minimis level from the entire installation in this application.

Since Holland 1916 is located in Clay County and potential to emit is greater than 2.7 tons of VOC, this installation is applicable to the requirement of Missouri State Rule 10 CSR 10-2.230 *Control of Emissions From Industrial Surface Coating Operations*. This requires all surface coating material to have a VOC content of less than or equal to 3.5 pounds per gallon. Based on the application, Holland 1916 is expected to be in compliance with this rule.

The following New Source Review permits have been issued to Holland 1916 from the Air Pollution Control Program.

Table 2: Permit History

Permit Number	Description
102002-007	Plant moved to North Kansas City

PROJECT DESCRIPTION

Holland 1916 has proposed to install a new, totally enclosed paint booth at their facility. Holland 1916 intended on installing an abrasive blasting station but has withdrawn that portion of the application and will move forward with the new paint booth only. The paint gun that Holland 1916 plans on using is a high volume low pressure (HVLP) paint gun and is rated at eight gallons of paint sprayed per hour. The HVLP paint gun will be coating nameplates that have a flat surface. A transfer efficiency of 60 percent is given to a HVLP paint gun coating flat surfaces. Holland 1916 will use panel particulate filter to control particulate emissions from the painting process. A control efficiency of 95 percent was given for the panel filters. Holland 1916 also included new solvent cleaning materials that they will use in addition to current cleaning solvents that have already been permitted in Construction Permit 102002-007. The maximum hourly usage rate for the solvents was estimated to be one gallon per hour.
Holland 1916 requested that an installation wide 40.0 ton per year VOC limit and a 10.0 ton per year individual HAP and 25.0 ton per year combined HAP be implemented in this permit. Holland 1916 uses coating that contains diethelene glycol monobutyl ether (DGME) which has a screening model action level (SMAL) of five tons per year. The

DGME was modeled using SCREEN3 in Construction Permit 102002-007 and found to be in compliance with its assigned risk assessment level (RAL) and since the new coatings associated with the new paint booth do not contain DGME that modeling analysis is still valid. Therefore a total of 10.0 tons annually of DGME was allowed to be emitted. Also, during the review of this permit it was noted that glycol ethers received a 10.0 ton per year limit; however, the SMAL for this HAP is 5.0 ton per year. The glycol ethers was not modeled and compared to its respective RAL therefore the glycol ethers should have been limited to 5.0 tons emitted on an annual basis. This permit will correct that error by limiting the glycol ether to less than the SMAL. This permit supersedes the previous installation wide limits found in Construction Permit 102002-007.

Also while reviewing Holland 1916's permit application it was noted that Xylol and Dimethylbenzene were reported as separate HAPs. These two individual chemicals are both considered part of the Xylene HAP group and should be combined and reported as total Xylene emissions, and kept below ten tons per year as required by the special conditions of this permit. The table below list all the coating and solvents that were considered in their application.

Table 3: Coatings and Solvents Considered in this Permit

Coatings		
Material ID	Description	VOC Content (lb/gal)
WB-406	Gloss Clear	3.38
WB-406F	Dull Clear	3.38
WB-761	High Gloss Black	3.00
WB-742	Semi-Gloss Black	3.05
WB-743	Gloss Medium Yellow	3.00
WB-744	Fire Red	3.00
WB-745	Gloss Ultra Blue	3.00
WB-746	Gloss Lemon Yellow	3.00
WB-748	Process Blue	3.00
WB-749	Peacock Blue	3.00
WB-750	Falk Blue	3.00
WB-751	Reflex Blue	3.00
WB-753	Medium Green	3.00
WB-754	Dresser Blue	3.00
WB-755	299 Blue	3.00
WB-757	286 Blue	3.00
WB-752	Gloss Brilliant Orange	3.00
WB-766	Wellmark Blue	3.22
WB-772	282C Gloss Blue	3.16
WB-779	Brown Semi Gloss	2.92
Cleaning Solvents		
Material ID	Description	VOC Content (lb/gal)
A-1005	Barsol Solvent	7.01
A5257	A-5257 Soak	7.18
S-560	S-560 Degreaser	0.18
142HT/Sur Dri	Sur Dri	6.65
A5285	Soak (Digital Resist)	7.26

EMISSIONS/CONTROLS EVALUATION

The emission factors used in the PM, PM_{10}, $PM_{2.5}$, VOCs and HAP emissions analysis for the new paint booth (EP-05) were developed from the Material Safety Data Sheet (MSDS) through the use of the mass balances around the process. The potential emissions of all pollutants were based on a maximum hourly application rate of eight gallon per hour. All particulate matter emissions are evaluated based on the solid content of material and transfer efficiency (60%) from the spray gun. The solids content of each material used varied so the worst case material was used to calculate the most conservative potential emission estimate. A fiberglass filter is being used to control the particulate matter emissions from the paint booths and is expected to have control efficiency of at least 95 percent.

The following table provides an emissions summary for this project. Existing potential emissions were taken from Construction Permit 102002-007. Existing actual emissions were taken from the installation's 2011 Emission Inventory Questionnaire (EIQ). Potential emissions of the application represent the potential of the new equipment, assuming continuous operation (8,760 hours per year).

Table 4: Emissions Summary (tons per year)

Pollutant	Regulatory *De Minimis/SMAL*[5] Levels	Existing Potential Emissions	Existing Actual Emissions (2011 EIQ)	Potential Emissions of the Application	New Installation Conditioned Potential
PM	25.0	N/D	N/D	2.36	9.71
PM_{10}	15.0	7.35	N/D	2.36	9.71
$PM_{2.5}$	10.0	N/D	N/D	2.36	9.71
SOx	40.0	0.01	N/D	N/A	0.01
NOx	40.0	0.86	0.068	N/A	0.86
VOC	40.0	<40.0	3.54	242.29	<40.0
CO	100.0	0.72	N/D	N/A	0.72
HAPs	10/25.0	<10.0/25.0	N/D	41.6	<25.0
Glycol Ether[1]	5.0[5]	<10.0	N/A	N/A	<5.0
DGBE[2]	5.0[5]	<10.0	N/A	N/A	<10.0
EGME[3]	N/A	N/A	N/A	N/A	N/A
Toluene	10.0[5]	<10.0	N/A	18.41	<10.0
Xylene[4]	10.0[5]	N/A	N/A	17.67	<10.0
Cumene	10.0[5]	N/A	N/A	1.26	<10.0
Ethyl Benzene	10.0[5]	N/A	N/A	4.26	<10.0

N/A = Not Applicable; N/D = Not Determined

[1] Glycol Ether has a SMAL of 5.0 ton per year and was not modeled against its Risk Assessment Level (RAL) via SCREEN3 in permit # 102002-007 therefore in this permit they will limited to 5.0 tons per year of Glycol Ether.

[2] DGBE = diethelene glycol monobutyl ether. In permit # 102002-007 DGBE was modeled using SCREEN3 and was found to in compliance with the 24 hour RAL of 4500.0 ug/m^3 therefore was limited to the individual HAP limit of 10.0 tons per year.

[3] EGME = ethylene glycol monobutyl ether. This HAP has been delisted since the issuance of permit # 102002-007 therefore it is no longer needed to be tracked.

[4] Xylene includes potential emissions as Xylol and Dimethylbenzene

[5] SMAL = Screen Modeling Action Level

PERMIT RULE APPLICABILITY

This review was conducted in accordance with Section (5) of Missouri State Rule 10 CSR 10-6.060, *Construction Permits Required*. Potential emissions of VOC and HAPs are conditioned below de minimis levels.

APPLICABLE REQUIREMENTS

Holland 1916 shall comply with the following applicable requirements. The Missouri Air Conservation Laws and Regulations should be consulted for specific record keeping, monitoring, and reporting requirements. Compliance with these emission standards, based on information submitted in the application, has been verified at the time this application was approved.

GENERAL REQUIREMENTS

- *Submission of Emission Data, Emission Fees and Process Information,* 10 CSR 10-6.110
- *Restriction of Particulate Matter to the Ambient Air Beyond the Premises of Origin*, 10 CSR 10-6.170
- *Restriction of Emission of Visible Air Contaminants*, 10 CSR 10-6.220
- *Restriction of Emission of Odors*, 10 CSR 10-6.165
- 10 CSR 10-2.230 *Control of Emissions From Industrial Surface Coating Operations*

STAFF RECOMMENDATION

On the basis of this review conducted in accordance with Section (5), Missouri State Rule 10 CSR 10-6.060, *Construction Permits Required*, I recommend this permit be granted with special conditions.

_____ _____

Gerad Fox Date
Environmental Engineer

PERMIT DOCUMENTS

The following documents are incorporated by reference into this permit:

- The Application for Authority to Construct form, dated February 28, 2012, received March 1, 2012, designating Holland 1916 as the owner and operator of the installation.

- U.S. EPA document AP-42, *Compilation of Air Pollutant Emission Factors*, Fifth Edition.

Attachment A - VOC Compliance Worksheet

Holland 1916
Clay County, S23, T50N, R33W
Project Number: 2012-03-006
Installation ID Number: 047-0178
Permit Number: _____

This sheet covers the month of _____ in the year _____.

Copy this sheet as needed.

Column 1	Column 2 (a)	Column 3	Column 4	Column 5	Column 6
Material Used, (Name)	Amount of Material Used (gal)	*Density (lbs/gal)	**VOC Content (Weight %)	***VOC Content (lbs/gal)	VOC Emissions (Tons)

(b) Curing Oven (EP-01) VOC Emissions = Natural Gas Usage in MMCF multiplied 5.5 lb/MMCF then divided by 2000	
(c) Total VOC Emissions Calculated for this Month in Tons:	
(d) 12-Month VOC Emissions Total from Previous Month's Worksheet in Tons:	
(e) Monthly VOC Emissions Total (b) from Previous Year's Worksheet in Tons:	
(f) Current 12-month Total of VOC Emissions in Tons: [(c) + (d) - (e)]	

*** If Density is not given use the following formula to calculate Density → (Specific Gravity) x (62.4) x (0.1337) = Density in (lbs/gal)**
**** VOC Content in weight percentage can be found in the MSDS of each specific product.**
***** VOC Content in lb/gal is calculated using the following Density (Column 3) X VOC Content (Column 4). In some case the VOC Content in lbs /gal will be directly given in the MSDS and no calculation for the VOC Content in lbs/gal will be necessary.**
INSTRUCTIONS:
(a) Usage is in gallons - [Column 2] x [Column 5] x [0.0005] = [Column 6];
(b) Holland 1916 must account for the VOC emission for the Curing Oven (EP-01). The total VOC emission from EP-01 must be included in the summation performed in row (c)
(c) Summation of [Column 6] in Tons;
(d) 12-Month VOC emissions (f) from last month's Attachment A in Tons;
(e) Monthly VOC emissions total (c) from the previous year's Attachment A in Tons;
(f) Calculate the new 12-month combined VOC emissions total. A 12-Month VOC emissions total (e) of less than **40.0** tons indicates compliance.

Attachment B – Individual HAP Compliance Worksheet

Holland 1916
Clay County, S23, T50N, R33W
Project Number: 2012-03-006
Installation ID Number: 047-0178
Permit Number: _____

Individual HAP:_____ *SMAL_____

This sheet covers the month of _____ in the year _____.

Copy this sheet as needed.

Column 1 Material Used, (Name, HAP CAS #)	Column 2 (a) Amount of Material Used (gal)	Column 3 **Density (lbs/gal)	Column 4 HAP Content (Weight %)	Column 5 HAP Emissions (Tons)

(b) Curing Oven Toluene Emissions = Natural Gas Usage in MMCF multiplied 0.0034 lb/MMCF then divided by 2000. THIS ROW IS TO BE USED FOR INDIVIDUAL TOLUENE EMISSIONS ONLY	
(c) Total Individual HAP Emissions Calculated for this Month in Tons:	
(d) 12-Month Individual HAP Emissions Total from Previous Month's Worksheet in Tons:	
(e) Monthly Individual HAP Emissions Total (b) from Previous Year's Worksheet in Tons:	
(f) Current 12-month Total of Individual HAP Emissions in Tons: [(c) + (d) - (e)]	

***Screening Model Action Level (SMAL). Can be found in Attachment D.**
****If Density is not given use the following formula to calculate Density → (Specific Gravity) x (62.4) x (0.1337) = Density in (lbs/gal)**
INSTRUCTIONS:
(a) Usage is in gallons - [Column 2] x [Column 3] x [Column 4] x [0.0005] = [Column 5];
(b) Holland 1916 must account for the Toluene emission for the Curing Oven (EP-01). The total Toluene emission in tons per year from EP-01 must be included in the summation performed in row (c). THIS ROW IS TO BE USED FOR INDIVIDUAL TOLUENE EMISSIONS ONLY
(c) Summation of [Column 5] in Tons;
(d) 12-Month Individual HAP emissions (f) from last month's Attachment A in Tons;
(e) Monthly Individual HAP emissions total (c) from the previous year's Attachment A in Tons;
(f) Calculate the new 12-month combined Individual HAP emissions total. A 12-Month Individual HAP emissions total (e) of less than **10.0** tons or its individual SMAL indicates compliance.

Attachment C – Aggregate HAP Compliance Worksheet

Holland 1916
Clay County, S23, T50N, R33W
Project Number: 2012-03-006
Installation ID Number: 047-0178
Permit Number: _____

This sheet covers the month of _____ in the year _____.
(month, year) (month, year)

Copy this sheet as needed.

Column 1 (a)	Column 2 (b)
List each HAP emitted from each individual Attachment B (HAP CAS #))	Total Individual HAP emissions for the Month from Attachment B [Column 5 (b)] (in Tons)

(c) Curing Oven VOC Emissions = Natural Gas Usage in MMCF multiplied 1.888 lb/MMCF then divided by 2000	
(d) Total Aggregate HAP Emissions Calculated for this Month, in Tons:	
(e) 12-Month Aggregate HAP Emissions Total (f) from Previous month's Worksheet C, in Tons:	
(f) Monthly Aggregate HAP Emissions Total (c) from Previous Year's Worksheet C, in Tons:	
(g) Current 12-month Total of Aggregate HAP Emissions in Tons: [(d) + (e) - (f)]:	

INSTRUCTIONS:
(a) Individually list each HAP emitted from this installation;
(b) Record the amount of HAP emissions already calculated for Attachment B in [Column 5 (b)] in Tons;
(b) Holland 1916 must account for the HAP emission for the Curing Oven (EP-01). The total HAP emission from EP-01 must be included in the summation performed in row (d)
(d) Summation of [Column 2] in Tons;
(e) Record the previous 12-Month aggregate HAP emission total (g) from last month's Attachment C, in Tons;
(f) Record the monthly aggregate HAP emission total (d) from previous year's Attachment C, in Tons:
(g) Calculate the new 12-month aggregate HAP emissions total. A 12-Month HAP emissions total of less than **25.0** indicate compliance.

Attachment D – Alternative Coating Potential to Emit Compliance Worksheet

Holland 1916
Clay County, S23, T50N, R33W
Project Number: 2012-03-006
Installation ID Number: 047-0178
Permit Number: _____

This sheet covers the period of _____.
(month, year)

[1]Material Name	[2,3] Individual HAP Name and CAS No.	[3] HAP is also Particulate Matter (yes / no)	[2] Individual HAP Content (weight %)	[2] Product Density (pounds per gallon)	[4] Maximum Hourly Design Rate (gallons per hour)	[5] Individual HAP PTE (tons per year)	[6] Individual HAP SMAL (tons per year)
(example) new coating	*Benzene 71-43-2*	*no*	*20.0%*	*10.0*	*8.0*	*70.08*	*2.0*
(example) new coating	*Cobalt 2-Ethylhexanoate 136-52-7*	*yes*	*0.2%*	*10.0*	*8.0*	*0.701*	*0.1*

[1] Record the names of all alternative coatings planned to be used (include reducer / thinner / hardener / primer / paint / etc).
[2] This information is reported on the respective coating's MSDS.
[3] Compare each ingredient on the MSDS against the chemical names listed in Appendix A for verification as a HAP and particulate matter.
[4] The Maximum Hourly Design Rate (MHDR) of the Holland 1916's gun is 8.0 gallons per hour. Determine the gallons per hour of each coating component by using the density of each component in the mixture, and the mixing ratio if mixing or reducing is required.
[5] Individual HAP PTE calculated by multiplying the Individual HAP Content, Product Weight, MHDR, and 4.38. If the HAP is also particulate matter (see Appendix A) then multiply the Individual HAP Content, Product Weight, MHDR, and 4.38; to account for transfer, capture, and control efficiency multiply the result by 0.57.
[6] Individual HAP SMAL as reported in Appendix A. If the Individual HAP PTE is equal to or greater than the Individual HAP SMAL, seek approval from the Air Pollution Control Program before using this coating.

Appendix A - Table of Hazardous Air Pollutants and Screening Model Action Levels (June 3, 2011 Revision 7)

Chemical	CAS #	SMAL (tons/yr)	Group ID	VOC	PM
ACETALDEHYDE	75-07-0	9		Y	N
ACETAMIDE	60-35-5	1		Y	N
ACETONITRILE	75-05-8	4		Y	N
ACETOPHENONE	98-86-2	1		Y	N
ACETYLAMINOFLUORINE, [2-]	53-96-3	0.005	V	Y	Y
ACROLEIN	107-02-8	0.04		Y	N
ACRYLAMIDE	79-06-1	0.02		Y	N
ACRYLIC ACID	79-10-7	0.6		Y	N
ACRYLONITRILE	107-13-1	0.3		Y	N
ALLYL CHLORIDE	107-05-1	1		Y	N
AMINOBIPHENYL, [4-]	92-67-1	1	V	Y	N
ANILINE	62-53-3	1		Y	N
ANISIDINE, [ORTHO-]	90-04-0	1		Y	N
ANTHRACENE	120-12-7	0.01	V	Y	N
ANTIMONY COMPOUNDS		5	H	N	Y
ANTIMONY PENTAFLUORIDE	7783-70-2	0.1	H	N	Y
ANTIMONY POTASSIUM TARTRATE	28300-74-5	1	H	N	Y
ANTIMONY TRIOXIDE	1309-64-4	1	H	N	Y
ANTIMONY TRISULFIDE	1345-04-6	0.1	H	N	Y
ARSENIC COMPOUNDS		0.005	I	N	Y
ASBESTOS	1332-21-4	0	A	N	Y
BENZ(A)ANTHRACENE	56-55-3	0.01	V	Y	N
BENZENE	71-43-2	2		Y	N
BENZIDINE	92-87-5	0.0003	V	Y	N
BENZO(A)PYRENE	50-32-8	0.01	V	Y	N
BENZO(B)FLUORANTHENE	205-99-2	0.01	V	Y	N
BENZO(K)FLUORANTHENE	207-08-9	0.01	V	Y	N
BENZOTRICHLORIDE	98-07-7	0.006		Y	N
BENZYL CHLORIDE	100-44-7	0.1		Y	N
BERYLLIUM COMPOUNDS		0.008	J	N	Y
BERYLLIUM SALTS		0.00002	J	N	Y
BIPHENYL, [1,1-]	92-52-4	10	V	Y	N
BIS(CHLOROETHYL)ETHER	111-44-4	0.06		Y	N
BIS(CHLOROMETHYL)ETHER	542-88-1	0.0003		Y	N
BROMOFORM	75-25-2	10		Y	N
BROMOMETHANE	74-83-9	10		Y	N
BUTADIENE, [1,3-]	106-99-0	0.07		Y	N
BUTOXYETHANOL ACETATE, [2-]	112-07-2	5	P	Y	N
BUTYLENE OXIDE, [1,2-]	106-88-7	1		Y	N
CADMIUM COMPOUNDS		0.01	K	N	Y
CALCIUM CYANAMIDE	156-62-7	10		Y	Y
CAPROLACTAM (Delisted)	105-60-2				
CAPTAN	133-06-2	10		Y	Y
CARBARYL	63-25-2	10	V	Y	Y
CARBON DISULFIDE	75-15-0	1		Y	N
CARBON TETRACHLORIDE	56-23-5	1		Y	N
CARBONYL SULFIDE	463-58-1	5		Y	N
CATECHOL	120-80-9	5		Y	N
CHLORAMBEN	133-90-4	1		Y	Y
CHLORDANE	57-74-9	0.01		Y	Y
CHLORINE	7782-50-5	0.1		N	N
CHLOROACETIC ACID	79-11-8	0.1		Y	N
CHLOROACETOPHENONE, [2-]	532-27-4	0.06		Y	N
CHLOROBENZENE	108-90-7	10		Y	N
CHLOROBENZILATE	510-15-6	0.4	V	Y	Y
CHLOROFORM	67-66-3	0.9		Y	N
CHLOROMETHYL METHYL ETHER	107-30-2	0.1		Y	N
CHLOROPRENE	126-99-8	1		Y	N
CHROMIUM (VI) COMPOUNDS		0.002	L	N	Y
CHROMIUM COMPOUNDS		5	L	N	Y
CHRYSENE	218-01-9	0.01	V	Y	N
COBALT COMPOUNDS		0.1	M	N	Y
COKE OVEN EMMISIONS	8007-45-2	0.03	N	Y	N
CRESOL, [META-]	108-39-4	1	B	Y	N
CRESOL, [ORTHO-]	95-48-7	1	B	Y	N
CRESOL, [PARA-]	106-44-5	1	B	Y	N
CRESOLS (MIXED ISOMERS)	1319-77-3	1	B	Y	N
CUMENE	98-82-8	10		Y	N
CYANIDE COMPOUNDS		0.1	O	Y	N
DDE	72-55-9	0.01	V	Y	Y
DI(2-ETHYLHEXYL) PHTHALATE, (DEHP)	117-81-7	5		Y	N
DIAMINOTOLUENE, [2,4-]	95-80-7	0.02		Y	N
DIAZOMETHANE	334-88-3	1		Y	N
DIBENZ(A,H)ANTHRACENE	53-70-3	0.01	V	Y	N
DIOXINS/FURANS		6E-07	D,V	Y	N
DIBENZOFURAN	132-64-9	5	V	Y	N
DIBROMO-3-CHLOROPROPANE, [1,2-]	96-12-8	0.01		Y	N
DIBROMOETHANE, [1,2-]	106-93-4	0.1		Y	N
DIBUTYL PHTHALATE	84-74-2	10		Y	Y
DICHLOROBENZENE, [1,4-]	106-46-7	3		Y	N
DICHLOROBENZIDENE, [3,3-]	91-94-1	0.2	V	Y	Y
DICHLOROETHANE, [1,1-]	75-34-3	1		Y	N
DICHLOROETHANE, [1,2-]	107-06-2	0.8		Y	N
DICHLOROETHYLENE, [1,1-]	75-35-4	0.4		Y	N
DICHLOROMETHANE	75-09-2	10		N	N
DICHLOROPHENOXY ACETIC ACID, [2,4-]	94-75-7	10	C	Y	Y
DICHLOROPROPANE, [1,2-]	78-87-5	1		Y	N
DICHLOROPROPENE, [1,3-]	542-75-6	1		Y	N
DICHLORVOS	62-73-7	0.2		Y	N
DIETHANOLAMINE	111-42-2	5		Y	N
DIETHYL SULFATE	64-67-5	1		Y	N
DIETHYLENE GLYCOL MONOBUTYL ETHER	112-34-5	5	P	Y	N
DIMETHOXYBENZIDINE, [3,3-]	119-90-4	0.1	V	Y	Y
DIMETHYL BENZIDINE, [3,3-]	119-93-7	0.008	V	Y	Y
DIMETHYL CARBAMOYL CHLORIDE	79-44-7	0.02		Y	N
DIMETHYL FORMAMIDE	68-12-2	1		Y	N
DIMETHYL HYDRAZINE, [1,1-]	57-14-7	0.008		Y	N
DIMETHYL PHTHALATE	131-11-3	10		Y	N
DIMETHYL SULFATE	77-78-1	0.1		Y	N
DIMETHYLAMINOAZOBENZENE, [4-]	60-11-7	1		Y	N
DIMETHYLANILINE, [N-N-]	121-69-7	1		Y	N
DINITRO-O-CRESOL, [4,6-] (Note 6)	534-52-1	0.1	E	Y	Y
DINITROPHENOL, [2,4-]	51-28-5	1		Y	N
DINITROTOLUENE, [2,4-]	121-14-2	0.02		Y	N
DIOXANE, [1,4-]	123-91-1	6		Y	N
DIPHENYLHYDRAZINE, [1,2-]	122-66-7	0.09	V	Y	Y
DIPHENYLMETHANE DIISOCYANATE, [4,4-]	101-68-8	0.1	V	Y	N
EPICHLOROHYDRIN	106-89-8	2		Y	N
ETHOXYETHANOL, [2-]	110-80-5	10	P	Y	N
ETHOXYETHYL ACETATE, [2-]	111-15-9	5	P	Y	N
ETHYL ACRYLATE	140-88-5	1		Y	N
ETHYL BENZENE	100-41-4	10		Y	N
ETHYL CHLORIDE	75-00-3	10		Y	N
ETHYLENE GLYCOL	107-21-1	10		Y	N
ETHYLENE GLYCOL MONOBUTYL ETHER (Delisted)	111-76-2				
ETHYLENE GLYCOL MONOHEXYL ETHER	112-25-4	5	P	Y	N
ETHYLENE IMINE [AZIRIDINE]	151-56-4	0.003		Y	N
ETHYLENE OXIDE	75-21-8	0.1		Y	N
ETHYLENE THIOUREA	96-45-7	0.6		Y	Y
FORMALDEHYDE	50-00-0	2		Y	N
GLYCOL ETHER (ETHYLENE GLYCOL ETHERS)		5	P	Y	N
GLYCOL ETHER (DIETHYLENE GLYCOL ETHERS)		5	P	Y	N
HEPTACHLOR	76-44-8	0.02		Y	N
HEXACHLOROBENZENE	118-74-1	0.01		Y	N
HEXACHLOROBUTADIENE	87-68-3	0.9		Y	N
HEXACHLOROCYCLOHEXANE, [ALPHA-]	319-84-6	0.01	F	Y	N
HEXACHLOROCYCLOHEXANE, [BETA-]	319-85-7	0.01	F	Y	N
HEXACHLOROCYCLOHEXANE, [DELTA-]	319-86-8	0.01	F	Y	N
HEXACHLOROCYCLOHEXANE, [TECHNICAL]	608-73-1	0.01	F	Y	N

Appendix A - Table of Hazardous Air Pollutants and Screening Model Action Levels (June 3, 2011 Revision 7)

Chemical	CAS #	SMAL (tons/yr)	Group ID	VOC	PM
HEXACHLOROCYCLOPENTADIENE	77-47-4	0.1		Y	N
HEXACHLOROETHANE	67-72-1	5		Y	N
HEXAMETHYLENE,-1,6-DIISOCYANATE	822-06-0	0.02		Y	N
HEXAMETHYLPHOSPHORAMIDE	680-31-9	0.01		Y	N
HEXANE, [N-]	110-54-3	10		Y	N
HYDRAZINE	302-01-2	0.004		N	N
HYDROGEN CHLORIDE	7647-01-0	10		N	N
HYDROGEN FLUORIDE	7664-39-3	0.1		N	N
HYDROQUINONE	123-31-9	1		Y	N
INDENO(1,2,3CD)PYRENE	193-39-5	0.01	V	Y	N
ISOPHORONE	78-59-1	10		Y	N
LEAD COMPOUNDS		0.01	Q	N	Y
LINDANE [GAMMA-HEXACHLOROCYCLOHEXANE]	58-89-9	0.01	F	Y	N
MALEIC ANHYDRIDE	108-31-6	1		Y	N
MANGANESE COMPOUNDS		0.8	R	N	Y
MERCURY COMPOUNDS		0.01	S	N	N
METHANOL	67-56-1	10		Y	N
METHOXYCHLOR	72-43-5	10	V	Y	Y
METHOXYETHANOL, [2-]	109-86-4	10	P	Y	N
METHYL CHLORIDE	74-87-3	10		Y	N
METHYL ETHYL KETONE (Delisted)	78-93-3				
METHYL HYDRAZINE	60-34-4	0.06		Y	N
METHYL IODIDE	74-88-4	1		Y	N
METHYL ISOBUTYL KETONE	108-10-1	10		Y	N
METHYL ISOCYANATE	624-83-9	0.1		Y	N
METHYL METHACRYLATE	80-62-6	10		Y	N
METHYL TERT-BUTYL ETHER	1634-04-4	10		Y	N
METHYLCYCLCOPENTADIENYL MANGANESE	12108-13-3	0.1	R	N	Y
METHYLENE BIS(2-CHLOROANILINE), [4,4-]	101-14-4	0.2	V	Y	Y
METHYLENEDIANILINE, [4,4-]	101-77-9	1	V	Y	N
METHYLNAPHTHALENE, [2-]	91-57-6	0.01	V	Y	N
MINERAL FIBERS		0	T	N	Y
NAPHTHALENE	91-20-3	10	V	Y	N
NAPHTHYLAMINE, [ALPHA-]	134-32-7	0.01	V	Y	N
NAPHTHYLAMINE, [BETA-]	91-59-8	0.01	V	Y	N
NICKEL CARBONYL	13463-39-3	0.1	U	N	Y
NICKEL COMPOUNDS		1	U	N	Y
NICKEL REFINERY DUST		0.08	U	N	Y
NICKEL SUBSULFIDE	12035-72-2	0.04	U	N	Y
NITROBENZENE	98-95-3	1		Y	N
NITROBIPHENYL, [4-]	92-93-3	1	V	Y	N
NITROPHENOL, [4-]	100-02-7	5		Y	N
NITROPROPANE, [2-]	79-46-9	1		Y	N
NITROSODIMETHYLAMINE, [N-]	62-75-9	0.001		Y	N
NITROSOMORPHOLINE, [N-]	59-89-2	1		Y	N
NITROSO-N-METHYLUREA, [N-]	684-93-5	0.0002		Y	N
OCTACHLORONAPTHALENE	2234-13-1	0.01	V	Y	N
PARATHION	56-38-2	0.1		Y	Y
PCB [POLYCHLORINATED BIPHENYLS]	1336-36-3	0.009	X	Y	Y
PENTACHLORONITROBENZENE	82-68-8	0.3		Y	N
PENTACHLOROPHENOL	87-86-5	0.7		Y	N
PHENOL	108-95-2	0.1		Y	N
PHENYLENEDIAMINE, [PARA-]	106-50-3	10		Y	N
PHOSGENE	75-44-5	0.1		Y	N
PHOSPHINE	7803-51-2	5		N	N
PHOSPHOROUS (YELLOW OR WHITE)	7723-14-0	0.1		N	N
PHTHALIC ANHYDRIDE	85-44-9	5		Y	N
POLYCYLIC ORGANIC MATTER		0.01	V	Y	N
PROPANE SULTONE, [1,3-]	1120-71-4	0.03		Y	Y
PROPIOLACTONE, [BETA-]	57-57-8	0.1		Y	N
PROPIONALDEHYDE	123-38-6	5		Y	N
PROPOXUR [BAYGON]	114-26-1	10		Y	Y
PROPYLENE OXIDE	75-56-9	5		Y	N
PROPYLENEIMINE, [1,2-]	75-55-8	0.003		Y	N
QUINOLINE	91-22-5	0.006		Y	N
QUINONE	106-51-4	5		Y	N
RADIONUCLIDES		Note 1	Y	N	Y
SELENIUM COMPOUNDS		0.1	W	N	Y
STYRENE	100-42-5	1		Y	N
STYRENE OXIDE	96-09-3	1		Y	N
TETRACHLORODIBENZO-P-DIOXIN,[2,3,7,8]	1746-01-6	6E-07	D,V	Y	Y
TETRACHLOROETHANE, [1,1,2,2-]	79-34-5	0.3		Y	N
TETRACHLOROETHYLENE	127-18-4	10		N	N
TITANIUM TETRACHLORIDE	7550-45-0	0.1		N	N
TOLUENE	108-88-3	10		Y	N
TOLUENE DIISOCYANATE, [2,4-]	584-84-9	0.1		Y	N
TOLUIDINE, [ORTHO-]	95-53-4	4		Y	N
TOXAPHENE	8001-35-2	0.01		Y	N
TRICHLOROBENZENE, [1,2,4-]	120-82-1	10		Y	N
TRICHLOROETHANE, [1,1,1-]	71-55-6	10		N	N
TRICHLOROETHANE, [1,1,2-]	79-00-5	1		Y	N
TRICHLOROETHYLENE	79-01-6	10		Y	N
TRICHLOROPHENOL, [2,4,5-]	95-95-4	1		Y	N
TRICHLOROPHENOL, [2,4,6-]	88-06-2	6		Y	N
TRIETHYLAMINE	121-44-8	10		Y	N
TRIFLURALIN	1582-09-8	9		Y	Y
TRIMETHYLPENTANE, [2,2,4-]	540-84-1	5		Y	N
URETHANE [ETHYL CARBAMATE]	51-79-6	0.8		Y	N
VINYL ACETATE	108-05-4	1		Y	N
VINYL BROMIDE	593-60-2	0.6		Y	N
VINYL CHLORIDE	75-01-4	0.2		Y	N
XYLENE, [META-]	108-38-3	10	G	Y	N
XYLENE, [ORTHO-]	95-47-6	10	G	Y	N
XYLENE, [PARA-]	106-42-3	10	G	Y	N
XYLENES (MIXED ISOMERS)	1330-20-7	10	G	Y	N

Legend

Group ID	Aggregate Group Name
A	Asbestos
B	Cresols/Cresylic Acid (isomers and mixtures)
C	2,4 - D, Salts and Esters
D	Dibenzofurans, Dibenzodioxins
E	4, 6 Dinitro-o-cresol, and Salts
F	Lindane (all isomers)
G	Xylenes (all isomers and mixtures)
H	Antimony Compounds
I	Arsenic Compounds
J	Beryllium Compounds
K	Cadmium Compounds
L	Chromium Compounds
M	Cobalt Compounds
N	Coke Oven Emissions
O	Cyanide Compounds
P	Glycol Ethers
Q	Lead Compounds (except elemental Lead)
R	Manganese Compounds
S	Mercury Compounds
T	Fine Mineral Fibers
U	Nickel Compounds
V	Polycyclic Organic Matter
W	Selenium Compounds
X	Polychlorinated Biphenyls (Aroclors)
Y	Radionuclides

Notes

Note 1 The SMAL for radionuclides is defined as the effective dose equivalent to 0.3 millirems per year for 7 years exposure associated with a cancer risk of 1 in 1 million

Mr. Adam Barksdale
President
Holland 1916
1340 N. Burlington Street
North Kansas City, MO 64116

RE: New Source Review Permit - Project Number: 2012-03-006

Dear Mr. Barksdale:

Enclosed with this letter is your permit to construct. Please study it carefully. Also, note the special conditions, if any, on the accompanying pages. The document entitled, "Review of Application for Authority to Construct", is part of the permit and should be kept with this permit in your files. Operation in accordance with these conditions and your new source review permit application is necessary for continued compliance. The reverse side of your permit certificate has important information concerning standard permit conditions and your rights and obligations under the laws and regulations of the State of Missouri.

If you have any questions regarding this permit, please do not hesitate to contact Gerad Fox, at the Department of Natural Resources' Air Pollution Control Program, P.O. Box 176, Jefferson City, MO 65102, or by telephone at (573) 751-4817. Thank you for your time and attention to this matter.

Sincerely,

AIR POLLUTION CONTROL PROGRAM

Susan Heckenkamp
New Source Review Unit Chief

SH:gfk

Enclosures

c: Kansas City Regional Office
PAMS File: 2012-03-006

Permit Number: