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: 042012-009
Project Number: 2011-11-025
Installation Number: 107-0004

Parent Company: Remington Arms Company
Parent Company Address: 870 Remington Drive, PO Box 700, Madison, NC 27025
Installation Name: Remington Arms Company-Lexington MO Facility
Installation Address: 1950 Roncelli, Lexington, MO 64067
Location Information: Lafayette County, S3, T51N, R27W

Application for Authority to Construct was made for:
The installation of a bypass pipe that would direct collected wood chips and sawdust from the baghouse and cyclones to an outdoor storage pile. This equipment was constructed prior to receipt of a permit from the Air Pollution Control Program. Obtaining this permit is part of a remedial enforcement action required by the Air Pollution Control Program. 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.

EFFECTIVE DATE: APR 17 2012
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 devises shall be operated and maintained as specified in the application, associated plans and specifications.

You must notify the Departments' Air Pollution Control Program of the anticipated date of start up 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 start up 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.
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.”

Remington Arms Company-Lexington MO Facility
Lafayette County, S3, T51N, R27W

1. Emission Limitation
   A. Remington Arms Company-Lexington MO Facility shall emit less than 15.0 tons of particulate matter less than ten microns in diameter (PM$_{10}$) in any consecutive 12-month period from the boiler bypass Emission Point 10 (EP-10).

   B. Attachment A or equivalent forms, such as electronic forms, approved by the Air Pollution Control Program shall be used to demonstrate compliance with Special Conditions 1.A. If electronic forms are used, they must be approved by the Air Pollution Control Program and contain at minimum the following:
   1) Monthly hours of operation of the boiler bypass (EP-10)
   2) PM$_{10}$ emission factor as stated in Attachment A
   3) Monthly PM$_{10}$ emissions from EP-10
   4) 12-Month rolling PM$_{10}$ emissions from EP-10 (lbs/yr)
   5) 12-Month rolling PM$_{10}$ emissions from EP-10 (tons/yr)

2. Record Keeping and Reporting Requirements
   A. Remington Arms Company-Lexington MO Facility 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.

   B. Remington Arms Company-Lexington MO Facility 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: 2011-11-025
Installation ID Number: 107-0004
Permit Number:

Remington Arms Company-Lexington MO Facility Complete: January 1, 2012
1950 Roncelli
Lexington, MO 64067

Parent Company:
Remington Arms Company
870 Remington Drive, PO Box 700
Madison, NC 27025

Lafayette County, S3, T51N, R27W

REVIEW SUMMARY

- Remington Arms Company-Lexington MO Facility has applied for authority to construct a bypass from the baghouse and two cyclones to exhaust sawdust and wood waste to an outdoor storage pile.

- Hazardous Air Pollutant (HAP) emissions are not expected from the proposed equipment.

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

- None of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) apply to this installation. None of the currently promulgated Maximum Achievable Control Technology (MACT) regulations apply to the proposed equipment.

- No air pollution control equipment is being used in association with the new equipment.

- This review was conducted in accordance with Section (5) of Missouri State Rule 10 CSR 10-6.060, Construction Permits Required. Potential emissions of PM$_{10}$ are conditioned below de minimis levels.

- This installation is located in Lafayette County, an attainment area for all 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 conditioned below de minimis levels

• Emissions testing is not required for the equipment.

• Approval of this permit is recommended with special conditions.

INSTALLATION DESCRIPTION

Remington Arms Co., Inc. operates a wooden gunstock manufacturing facility in Lafayette County, Missouri. This facility was owned by S & K Industries, Inc. until purchased by Remington Arms Co., Inc. in September of 2009. The installation is a minor source for construction permits and a major source for operating permits. A Part 70 Operating Permit was issued to the installation in June, 2002 and a Part 70 Operating Permit Renewal Application was submitted by S & K Industries, Inc. in April, 2007 (Project 2007-04-139).

The following construction permits have been issued to Remington Arms Co., Inc. from the Air Pollution Control Program.

Table 1: Permit History

<table>
<thead>
<tr>
<th>Permit Number</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>1089-006</td>
<td>Installation of a wood-fired boiler, a horizontal spray booth and three (3) spray paint booths.</td>
</tr>
<tr>
<td>0791-011</td>
<td>The permitting of an existing wooden gunstock manufacturing facility that was built prior to receiving a permit from the Air Pollution Control Program.</td>
</tr>
<tr>
<td>0792-036</td>
<td>Installation of four (4) dry filter spray paint booths.</td>
</tr>
<tr>
<td>032010-011</td>
<td>Installation of a controlled pyrolysis cleaning furnace</td>
</tr>
</tbody>
</table>

A Notice of Excessive Emissions NOEE#KCR2011090808142964 was issued as a result of an investigation on September 6 and 7, 2011. On October 13, 2011, a Letter of Warning (LOW) was issued requesting a [construction] permit application and compliance plan be submitted for the modification allowing sawdust collected by the baghouse to be routed to the outdoor storage pile.

PROJECT DESCRIPTION

The facility is currently permitted to burn as fuel 900 tons per year (approximately 198 pounds per hour) of untreated wood chips and sawdust generated from operations at the facility. The wood chips and sawdust generated at the facility are exhausted and collected into a baghouse and two cyclones, where it is directed to a storage silo and eventually to the wood-fired boiler. The boiler is used to heat the buildings during the cold weather months. During the warm weather months, the collected wood chips and sawdust from the baghouse and cyclones are directed via a bypass pipe to an outdoor storage pile. The exhaust from this bypass is designated as emission point EP-10. A flexible hose was installed at the exhaust of EP-10, which extends to the ground, to mitigate and correct potential opacity issues associated with this emission point. The collected woodchip and sawdust is leveled out where it becomes compacted and biologically degrades over time (similar to what occurs with mulch).
EMISSIONS/CONTROLS EVALUATION

The uncontrolled emission factor from the exhaust of the sawdust was calculated using the particle size distribution of sanding taken from the “Estimating Emissions from Generation and Combustion of Waste” word document that was prepared by the Wood Waste and Furniture Emissions Task Force in North Carolina. It was estimated that 23.8 percent of the sawdust generated to be PM$_{10}$. There is no particle size distribution for particulate matter less than 2.5 microns in aerodynamic diameter (PM$_{2.5}$), using engineering judgment, it was assumed that 50 percent of all PM$_{10}$ to be PM$_{2.5}$.

The maximum hourly design rate (MHDR) was calculated based on a two month period measurement by Remington Arms of the sawdust directed through EP-10. A volume of 4,800 cubic feet (ft$^3$) was collected at the storage pile. Using 15 pounds per cubic foot (lbs/ft$^3$) as the weight of sawdust, the total amount in that two month period was 72,000 pounds (lbs). The operation parameters of the sample measurement were 10.5 hours per day (hrs/day) (7:00am to 5:30pm), 4 days per week, and a total of 8 weeks. It was then calculated that 214 pounds per hour (lbs/hr) of sawdust was directed through EP-10.

Potential emissions of the application represent the potential emissions associated with sawdust generated, assuming continuous bypass (8760 hours per year.) The following table provides an emissions summary for this project.

**Table 2: Emissions Summary (tons per year)**

<table>
<thead>
<tr>
<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td>PM$_{10}$</td>
<td>15.0</td>
<td>47.39</td>
<td>223.38</td>
<td>&lt;15.0</td>
</tr>
<tr>
<td>PM$_{2.5}$</td>
<td>10.0</td>
<td>N/D</td>
<td>111.69</td>
<td>7.5$^1$</td>
</tr>
<tr>
<td>SOx</td>
<td>40.0</td>
<td>N/D</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>NOx</td>
<td>40.0</td>
<td>0.9</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>VOC</td>
<td>40.0</td>
<td>229.95</td>
<td>18.54</td>
<td>N/A</td>
</tr>
<tr>
<td>CO</td>
<td>100.0</td>
<td>14.80</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>HAPs</td>
<td>10.0/25.0</td>
<td>N/D</td>
<td>N/A</td>
<td>N/A</td>
</tr>
</tbody>
</table>

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

Note 1: Existing potential emissions calculated by summing emissions from permits no. 1089-006, 0791-011, 0792-036, and 032010-011 and no permit required letter project no. 2000-08-047. The emissions are based on conditioned potential emissions.

Note 2: There are no industry standards for PM$_{2.5}$ emission rate, therefore a conservative estimate of 50% of PM$_{10}$ was used to calculate PM$_{2.5}$.

Note 3: PM$_{2.5}$ is indirectly limited by PM$_{10}$.

**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 PM$_{10}$ are conditioned below de minimis levels.
APPLICABLE REQUIREMENTS

Remington Arms Company-Lexington MO Facility 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. For a complete list of applicable requirements for your installation, please consult your operating permit.

GENERAL REQUIREMENTS

- Submission of Emission Data, Emission Fees and Process Information, 10 CSR 10-6.110
- Operating Permits, 10 CSR 10-6.065
- 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

SPECIFIC REQUIREMENTS

- Restriction of Emission of Particulate Matter From Industrial Processes, 10 CSR 10-6.400

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.

Kathy Kolb
Environmental Engineer

Date

PERMIT DOCUMENTS

The following documents are incorporated by reference into this permit:

- The Application for Authority to Construct form, dated November 14, 2011, received November 18, 2011, designating Remington Arms Company as the owner and operator of the installation.
- Kansas City Regional Office Site Survey, dated December 14, 2011.
Mr. Gerald Helmer  
Process Engineer  
Remington Arms Company-Lexington MO Facility  
1950 Roncelli  
Lexington, MO 64067  


Dear Mr. Helmer:  

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, your new source review permit application and with your amended operating permit 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 Kathy Kolb, at the Air Pollution Control Program, P.O. Box 176, Jefferson City, MO 65102 or at (573) 751-4817.  

Sincerely,  

AIR POLLUTION CONTROL PROGRAM  

Susan Heckenkamp  
New Source Review Unit Chief  

SH:kkl  

Enclosures  

c: Kansas City Regional Office  
PAMS File: 2011-11-025  

Permit Number: