

GOVERNMENT OF THE DISTRICT OF COLUMBIA
Department of Energy and Environment

TECHNICAL SUPPORT MEMORANDUM

TO: File

FROM¹: Stephen S. Ours, P.E. *SSO*
Chief, Permitting Branch

SUBJECT: **Permit #6964 to Operate a Paint Spray Booth at Northeast Iron Works**

DATE: November 22, 2016

BACKGROUND INFORMATION

A permit application was received by the Air Quality Division (AQD) on October 22, 2014 to operate an existing paint spray booth at Northeast Iron Works at 2632 Douglas Street NE, Washington, DC. The applicant is Northeast Iron Works, Inc. The paint booth is located at the facility listed above, and has never previously been permitted by AQD. The responsible person listed for operating the paint booth and complying with permit conditions is Mr. Daniel Pronio at (202) 529-9440.

The permit action is scheduled to be published in the DC Register on December 2, 2016. Public comments for the permit action will be solicited through January 3, 2017.

Northeast Iron Works has not requested that any of the materials submitted with this application be held confidential.

TECHNICAL INFORMATION

The equipment to be covered by this permit is a paint booth used primarily for “ornamental” paint jobs (such as hand railings). The activities at this location include paint spraying using high volume low pressure (HVLP) spray guns as well as manual applications using rollers, paint brushes, and aerosol spray cans to apply paint. The majority of the work will be performed on metal products, with some painting on plastic and wood. No chemical stripping operations will occur at this location.

The applicant has indicated that they will not use coatings containing target hazardous air pollutants regulated under 40 CFR 63, Subpart HHHHHH. The applicant has also indicated that carbon filters with a MERV 8 rating are installed on the paint booth that control odors as well as pollutant emissions. The release height of the exhaust is 24 feet.

¹ This memorandum and related permit were originally drafted by Gaurav Bansal, Environmental Engineer, but substantially revised and finalized after his employment with the Department had ended.

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REGULATORY REVIEW

Chapter 2, Section 200: General Permit Requirements:

A paint spray paint booth is a potential air pollution source because paint contains volatile organic compounds and particulate matter. Thus a Chapter 2 permit is required.

Chapter 6: Particulates:

The visible emissions limitations of 20 DCMR 606 are applicable to this facility. Proper operation of the equipment and maintenance of paint booth filters would preclude any visible emissions, even during startup or shutdown, so Condition II(c) requires that no visible emissions be emitted.

Chapter 7: Volatile Organic Compounds and Hazardous Air Pollutants

The requirements of 20 DCMR 700 were included in the permit. Because the facility will not be performing activities regulated by other sections of Chapter 7, such as mobile equipment repair and refinishing, most activities occurring in this unit will be regulated under this section. Many of the monitoring and record keeping requirements in the permit are designed to document compliance with this section.

20 DCMR 708 could be applicable to this application, but since revisions of Chapter 7 took place affecting this section and due to questions regarding the practical enforceability of this section as revised, AQD has determined that it is not appropriate to include the requirements of 20 DCMR 708 in the permit.

The requirements of 20 DCMR 718 are not applicable to this paint spray booth as the facility is not coating mobile equipment. As such, this section has not been addressed in this permit.

The "Architectural and Industrial Maintenance Coating" requirements of 20 DCMR 773 through 778 are not applicable to this paint spray booth as the facility is only painting architectural equipment in a shop (ie. "shop application" as defined in 20 DCMR 799). As such, these sections have not been addressed in this permit.

Although the permit application did not specify the use of any adhesives, sealants, adhesive primers, or sealant primers, Condition III(b) was written to ensure that no activities trigger the requirements of 20 DCMR 743-749 (commonly known as the "adhesives and sealants rule").

Chapter 9, Section 903: Odorous or Other Nuisance Air Pollutants

"An emission into the atmosphere of odorous or other air pollutants from any source in any quantity and of any characteristic, and duration which is, or is likely to be injurious to the public health or welfare, or which interferes with the reasonable enjoyment of life or property is prohibited [20 DCMR 903.1]" is applicable to all sources. It is contained in Condition II(c) of the permit. The community in the area of this shop has had concerns about paint odors that may or may not be coming from this shop. As such, a requirement to use filters that have activated

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carbon in them to control odors has been included in Condition III(g) of the permit. These filters must be replaced sufficiently often to ensure compliance with 20 DCMR 903.

40 CFR 63 Subparts MMMM, PPPP, QQQQ, RRRR: National Emission Standards for Hazardous Air Pollutants (NESHAPs)

Subparts MMMM, PPPP, QQQQ, and RRRR relate to NESHAP requirements for surface coatings of miscellaneous metal parts and products, plastic parts and products, wood building products, and metal furniture, respectively. None these subparts are applicable to this paint spray booth as the facility does not use coatings and/or other materials used in painting operations in quantities that meet or exceed the defined minimum limits necessary to trigger applicability of the said Subparts.

40 CFR 63 Subpart HHHHHH: National Emission Standards for Hazardous Air Pollutants: Paint Stripping and Miscellaneous Surface Coating Operations at Area Sources

This subpart applies to paint stripping and miscellaneous surface coating operations at area sources. This subpart is not applicable to the paint booth in question because it does not perform paint stripping, does not paint any motor vehicles or mobile equipment, and does not use coatings that contain any target HAP (specifically chromium, lead, manganese, nickel, or cadmium).

40 CFR 63 Subpart XXXXXX: National Emission Standards for Hazardous Air Pollutants Area Source Standards for Nine Metal Fabrication and Finishing Source Categories

AQD determined this regulation for metal fabrication was not applicable to the facility because its SIC code did not fall under one of the specific SIC codes for which this subpart is applicable.

RECOMMENDATIONS

The proposed project and attached permit comply with all applicable federal and District air pollution control laws and regulations.

Public comments for the permit action will be solicited from December 2, 2016 through January 3, 2017. AQD will resolve any comments received before issuing any permit. If no comments are received, I recommend that permit #6964 be issued in accordance with 20 DCMR 200.1 and 200.2 promptly upon completion of the public review period.

SSO

