



Federal Regulations for Surface Coating of Motor Vehicles and Mobile Equipment at Area Sources

This fact sheet is designed to help Illinois facilities that **spray apply coatings on motor vehicles and/or mobile equipment** comply with the requirements found in the *NESHAP for Paint Stripping and Miscellaneous Surface Coating Operations at Area Sources (Rule)*. This fact sheet does not contain a review of the entire Rule, but provides an overview of who is subject to the new Rule, the requirements, compliance dates, and where to go for additional help. It is to be used only as a guide and is not a substitute for reading and understanding the final Rule. If you have any questions you can contact the Illinois Small Business Environmental Assistance Program at 800/252-3998 or visit our web site at www.ienconnect.com/enviro for more information including the complete rule text.

OVERVIEW OF THE RULE

One of the goals of the Federal Clean Air Act is to reduce the emission of hazardous air pollutants (HAPs). The reduction of HAPs is achieved through the promulgation of emission standards for categories of sources that emit HAPs. The U.S. Environmental Protection Agency (U.S. EPA) identified 30 HAPs that pose the greatest threat to public health in urban areas. U.S. EPA has identified categories of area sources (small emitters of HAPs) that account for 90% of the releases of the 30 urban HAPs and are now promulgating standards to reduce the emissions of the urban HAPs. These federal standards are referred to as the National Emission Standards for Hazardous Air Pollutants (NESHAP).

The NESHAP for Paint Stripping and Miscellaneous Surface Coating Operations at Area Sources (Rule) was proposed in the Federal Register on September 17, 2007 and the final Rule was promulgated on January 9, 2008. The Rule regulates three activities:

- 1) Paint stripping using methylene chloride.
- 2) Surface coating of motor vehicles and mobile equipment.
- 3) Surface coating of miscellaneous metal and/or plastic parts.

The final Rule, Title 40, Part 63, Subpart HHHHHH of the Code of Federal Regulation (40 CFR 63) is found in the Federal Register notice published January 9, 2008 (pages 1760-1768). To assist you in cross referencing the Federal Register notice, sections of the Subpart are identified throughout the fact sheet (e.g. §63.11180).

This factsheet is designed to specifically cover information for the surface coating of motor vehicles and mobile equipment portion of the rule.

A link to the Rule and information for paint stripping other industries that surface coat miscellaneous metal and/or plastic parts can be found at: www.ienconnect.com/enviro.

APPLICABILITY

The Rule applies to **area sources**. An area source has the potential to emit less than 10 tons per year of a single hazardous air pollutant (HAP) and less than 25 tons per year of any combination of HAPs. If a facility emits more than these amounts, they are **major sources** and not subject to this Rule. However, they may be subject to (40 CFR 63) Subparts MMMM or PPPP. If you need assistance in determining whether or not your facility is an area source, please contact the Illinois Small Business Environmental Assistance Program at (800) 252-3998.

Your facility is subject to the Rule if it is an **area source** and you **spray-apply coatings** on assembled **motor vehicles** and/or **mobile equipment**. The rule is targeting coatings that **contain the following HAP: chromium, lead, manganese, nickel and cadmium**. You should review the MSDS sheets for all of the coatings that you spray apply to identify those that may contain compounds made up of these targeted

pollutants. It may sound simple, but understanding the definitions of the bolded terms is critical to determining what is and isn't subject to the Rule.

Spray application means coatings are applied using a hand-held device that atomizes the coating. The following applications, however, are not included in the definition of spray application:

- Hand-held devices with a paint cup capacity equal or less than 3 fluid ounces. Mobile automotive refinishers that perform spot repairs at customer locations are subject to the Rule only if they use a spray gun with a cup size greater than 3.0 fluid ounces. Mobile refinishers still need to comply with all other applicable environmental regulations such as those pertaining to hazardous waste management and disposal.
- Powder coating.
- Hand held non-refillable aerosol containers.
- Non-atomizing applications such as paint brushes, rollers, and flow and dip coatings.

Coating means a material spray-applied for decorative, protective or functional purposes. It does not include: adhesives, sealants, maskants, or temporary protective coatings or surface preparation materials, such as solvents used to remove dirt and grease.

(Note: When determining compliance with other State of IL rules regarding coatings, the materials above may be included in the coatings definition for those regulations. This definition of coatings is specifically for this federal rule.)

Motor vehicles means any self-propelled vehicle including but not limited to automobiles, light duty trucks, golf carts, vans and motorcycles.

Mobile equipment means any device that may be drawn and/or driven on a roadway including but not limited to, heavy duty trucks, truck trailers, fleet delivery trucks, buses, mobile cranes, bulldozers, street cleaners, agriculture equipment, motor homes, and other recreational vehicles including camping trailers and fifth wheels.

Paint Stripping means use of methylene chloride (MeCl) for the removal of dried paint (includes paint, enamel, varnish, shellac, and lacquer) from wood, metal, plastic and other substrates.

In addition, the Rule **does not apply** to:

- Refinishing of mobile equipment in the field or at the site they are used in service at which they are intended to remain indefinitely after refinishing. This includes:
 - Farm and mining equipment for which it is not practical or feasible to move to a dedicated mobile refinishing facility.
 - Fork trucks used in a manufacturing facility and which are refinished in that same facility.
- Individuals that surface coat no more than two motor vehicles or pieces of mobile equipment per year regardless if compensation is received. To put in another way, a hobbyist that applies a coating on more than two motor vehicles in a year, regardless if compensation is received, will be subject to the Rule.
- Installations owned or operated by the Armed Forces of the United States (including the Coast Guard and the National Guard).
- Military munitions (ammunition products and components) manufactured by or for the Armed Forces of the United States or equipment used for the purposes of transporting military munitions.
- Research and laboratory activities as defined in §63.11180.
- Quality Control activities as defined in §63.11180.

-
- - Those applying coatings using only the following techniques:
 - Hand-held devices with a paint cup capacity equal or less than 3 fluid ounces. Mobile automotive refinishers that perform spot repairs at customer locations are subject to the Rule only if they use a spray gun with a cup size greater than 3.0 fluid ounces. Mobile refinishers still need to comply with all other applicable environmental regulations such as those pertaining to hazardous waste management and disposal.
 - Powder coating.
 - Hand held non-refillable aerosol containers.
 - Non-atomizing applications such as paint brushes, rollers, and flow and dip coatings

Petition for Exemption

The regulation allows for the owner or operator of motor vehicle or mobile equipment surface coating operations to petition the USEPA and Illinois EPA for an exemption from the regulation if it can be demonstrated that the coatings that are spray applied do not contain compounds that include the target hazardous air pollutants (HAP) chromium, lead, manganese, nickel, or cadmium; however, if the facility has not been granted exemption by Jan 10, 2010 or before commencing operation the facility must still file the initial notification with USEPA and Illinois EPA.

: Should a facility that has been granted exemption from the surface coating regulations begin using the targeted HAP containing coatings all regulatory requirements will apply and compliance must be achieved prior to applying HAP containing coatings.

You should review the MSDS sheets for all of the coatings that you spray apply to identify those that may contain compounds made up of these targeted pollutants. You cannot petition for exemption from the paint stripping portion of the rule.

More information as well as forms to petition for exemption can be found at: www.iencconnect.com/enviro

DEFINITIONS OF NEW AND EXISTING SOURCES

The date by which you should be in compliance with the requirements depends on whether your surface coating operation is considered “new” or “existing.”

A **new source** means the initial startup of the surface coating operation at the facility occurred after September 17, 2007.

An **existing source** means that the facility was engaged in surface coating on or before September 17, 2007, or the facility began the installation of the surface coating equipment on or before this date.

GENERAL REQUIREMENTS

The general requirements can be divided into three parts:

- enclosures,
- cleaning,
- training.

ENCLOSURES

Spray-applied coatings **must be applied in a preparation station or spray booth and meet the following requirements:**

- The stations and booths must be fitted with a filter technology that can achieve at least 98% capture of paint overspray. See §63.11173(e)(2)(i) for information on demonstrating filter efficiency.
- For refinishing complete motor vehicles and mobile equipment, the preparation stations and spray booths must be fully enclosed with a full roof and four complete walls or side curtains and must be ventilated at negative pressure so that air is drawn into any openings in the station curtains or booth walls. [§63.11173(e)(2)(ii)]
- If a spray booth is fully enclosed and has seals on all doors and openings and has an automatic pressure balancing system, it may be operated up to, but not more than, 0.05 inches of water gauge positive pressure. [§63.11173(e)(2)(ii)]
- For refinishing vehicle subassemblies (i.e., fenders, bumper fascias, trim, etc.), the preparation station or spray booth must have a full roof, at least three complete walls or complete side curtains, and must be ventilated so that air is drawn into the station or booth. [§63.11173(e)(2)(iii)]

Portable or mobile ventilated enclosures are acceptable alternatives to a full-size preparation station or spray booth for small repairs. The enclosure does need to be ventilated so that the air is drawn into and paint overspray is captured by the enclosure. **IMPORTANT: The enclosure is subject to the same filter technology required for full-size stations and booths.**

TYPE AND CLEANING OF APPLICATION EQUIPMENT

All spray-applied coatings must be applied with a high-volume low-pressure (HVLP), electrostatic, air-assisted airless application, or an equivalent technology. See §63.11173(e)(3) for the procedure to demonstrate equivalent technology.

Paint spray guns must be cleaned so that an atomized mist or spray of gun cleaning solvent and paint residue is not created outside of a container that collects the used gun cleaning solvent. Acceptable options include hand cleaning of gun parts in a solvent container by flushing solvent through the gun without atomizing the solvent and paint residue, or using a fully enclosed spray gun washer.

Paint Stripping

If you use paint strippers containing methylene chloride, you must meet the following requirements:

- Evaluate each application to ensure there is a need for paint stripping.
- Evaluate each methylene chloride paint stripping operation to ensure there is no alternative technology that can be used.
- Reduce exposure of paint strippers containing methylene chloride to the air.
- Optimize application conditions to reduce evaporation.
- Practice proper storage and disposal of paint strippers.

If you use more than one (1) ton of methylene chloride annually (approximately 150 gallons), you must do the following:

- Implement the requirements above.
- Maintain records on site at all times of annual usage of paint strippers containing methylene chloride.
- Develop and implement a written methylene chloride minimization plan. The plan must be kept on site.
- Post a placard or sign outlining the methylene chloride minimization plan in each area where the paint stripping occurs.

For more information regarding paint stripping requirements see the rule at www.iencconnect.com/enviro.

In addition, Illinois motor vehicle refinishers located in the following counties: McHenry, Lake, DuPage, Kane, Cook, Kendall (Oswego Township only), Grundy (Goose Lake and Aux Sable Townships only), Will, Madison, Monroe and St. Clair must also comply with State of Illinois requirements under Subpart HH of 35 Illinois Administrative Code 218.780-218.791 and 219.780-219.791.

Shops located in those counties and using over 20 gallons of solvents and coatings annually must:

- *Store all fresh and used solvent, solvent-laden cloths and paper, waste paint, and sludge in closed containers to reduce emissions*
- *Clean all coating applicator guns with a device that recirculates solvents during cleaning, collects used solvent, and minimizes solvent evaporation.*

TRAINING AND CERTIFICATION

Train and certify all spray equipment operators in the proper application of surface coatings, and the proper setup and maintenance of spray equipment. [§63.11173(f)]

Initial and refresher training must, at a minimum, meet the following requirements:

- A list must be maintained of current personnel (by name and job description) who are required to be trained. [§63.11173(f)(1)]
- **Hands-on** and classroom instruction that addresses, at a minimum, the following [§63.11173(f)(2)]:
 - Spray gun equipment selection, setup, and operation; including measuring coating viscosity, selecting the proper fluid tip or nozzle, and achieving the proper spray pattern, air pressure and volume, and fluid delivery rate.
 - Spray technique for different types of coatings to improve transfer efficiency and minimize coating usage and overspray, including maintaining the correct spray gun distance and angle to the part, using proper banding and overlap, and reducing lead and lag spraying at the beginning and end of each stroke.
 - Routine spray booth and filter maintenance, including filter selection and installation.
 - Environmental compliance with the requirements of this Rule.
- A description of methods to be used at the completion of initial or refresher training to demonstrate, document, and provide certification of successful completion of training. Initial training will not be required if it can be demonstrated that a spray equipment operator's work experience and/or previous training meets the requirements in the Rule and is within five (5) years of the date the training is required. [§63.11173(f)(3)]
- Spray equipment operators must be re-certified every five (5) years.

TIP: Consult with your paint vendor, as many programs are already available that meet or exceed these criteria. In house training programs are acceptable under the rule provided the training meets all requirements of the rule and written documentation can be provided.

NOTIFICATIONS/REPORTS

The Rule requires: 1) an **initial notification** identifying basic information about the facility 2) **notification of compliance status** with the general requirements of the Rule and 3) **annual notification of changes report** to be submitted if there are changes at your facility that impacts information on forms you have previously submitted or if there are deviations from the regulatory requirements that occurred during the previous calendar year. For a form you can use to comply with these requirements, go to www.ienconnect.com/enviro

Notification and Compliance reports must be sent to both the USEPA and the Illinois EPA at the following addresses:

**Illinois Environmental Protection Agency
Bureau of Air, Compliance Section MC 40
1021 N. Grand Ave East
P.O. Box 19276
Springfield, IL 62794**

**USEPA Region 5
Air Enforcement & Compliance Assurance
Branch AE-17J
77 West Jackson Blvd
Chicago, IL 60604**

SUMMARY OF COMPLIANCE DATES

REQUIREMENTS	SOURCE TYPE	
	NEW	EXISTING
General - Enclosures	January 9, 2008 or upon startup, whichever is later	January 10, 2011
General - Cleaning	January 9, 2008 or upon startup, whichever is later	January 10, 2011
General – Training	No later than 180 days after hiring or by July 7, 2008, whichever is later.	No later than 180 days after hiring or by January 10, 2011, whichever is later.
Initial Notification	July 7, 2008 or 180 days after initial startup, whichever is later.	January 11, 2010
Notice of Compliance Status	Compliance certification must be included with the initial notification.	March 11, 2011
Recordkeeping	January 9, 2008 or upon startup, whichever is later	January 10, 2011
Annual Notification of Changes Report	March 1 of the following calendar year if any changes had occurred.	March 1 of the following calendar year if any changes had occurred.

***It is important to note that if you have missed appropriate compliance dates for notifications and certifications, they should be filed as soon as possible.**

RECORDKEEPING REQUIREMENTS

The following records must be maintained:

- Training certifications for each painter with the date of the initial training and the most recent refresher training completed. [§63.11177(a)]
- Documentation of the efficiency of the exhaust filter material. [§63.11177(b)]
- Documentation from the spray gun manufacturer that each spray gun with a cup capacity equal to or greater than 3.0 fluid ounces that does not meet the definition of an HVLP, electrostatic, airless, or air-assisted airless spray gun, has been determined to achieve equivalent transfer efficiency to that of an HVLP spray gun. [§63.11177(c)]

-
- Copies of your Initial Notification and Notification of Compliance Status, and all submitted copies of the Annual Notification of Changes report. [§63.11177(d)]
 - Records of any deviations from the general, notification and reporting requirements of this Rule. Include the date and time period of the deviation and a description of the deviations and actions taken to correct the deviation). [§63.11177(g)]
 - Any documents supporting the claims made in your Initial Notification, Notification of Compliance Status, and Annual Notification of Changes report. [§63.11177(h)]

Records (either in a printed or electronic format) must be maintained for at least five years after the date of each record. **Copies of records must be kept at the facility** conducting the surface coating operations and made available for inspection for at least 2 years after their date and may be kept offsite after that 2 year period.

ADDITIONAL ILLINOIS AIR REGULATIONS:

Organic Material Emission Standards for Motor Vehicle Refinishing, Subpart HH of 35 Illinois Administrative Code 218.780-218.791 and 219.780-219.791

Illinois motor vehicle refinishers located in the following counties:

- McHenry, Lake, DuPage, Kane, Cook, Kendall (Oswego Township only), Grundy (Goose Lake and Aux Sable Townships only), Will, Madison, Monroe and St. Clair

must also comply with State of Illinois requirements under the *Organic Material Emission Standards for Motor Vehicle Refinishing, Subpart HH of 35 Illinois Administrative Code 218.780-218.791 and 219.780-219.791*

The Subpart HH of 35 Illinois Administrative Code 218.780-218.791 and 219.780-219.791 requires that all fresh and used solvent, solvent-laden cloths and paper, waste paint, and sludge are stored in closed containers in order to reduce emissions.

All sources that use over 20 gallons of coatings per year must also:

- use electrostatic or high volume low pressure (HVLP) spray equipment, or use an equivalent coating applicator technology that is demonstrated by the manufacturer to achieve transfer efficiency comparable to the HVLP spray and that has been approved **in writing** by USEPA;
- clean all coating applicator guns with a device that recirculates solvents during cleaning, collects used solvent, and minimizes solvent evaporation.

Facilities cannot petition for exemption from the Organic Material Emission Standards for Motor Vehicle Refinishing, Subpart HH of 35 Illinois Administrative Code 218.780-218.791 and 219.780-219.791

In addition, any facility using over 5,000 gallons of coatings (to include but not limited to paints, varnishes, sealers, adhesives, diluents, inks and thinners) are required to be permitted by the Illinois EPA Bureau of Air.

For more information regarding permitting requirements visit www.iencconnect.com/enviro or call the IL Small Business Environmental Assistance Program at 800/252-3998.

The Illinois Small Business Environmental Assistance Program provides assistance to Illinois companies in understanding their environmental requirements.