FACT SHEET

FINAL AMENDMENTS TO THE AIR TOXICS STANDARDS FOR NINE CHEMICAL SECTOR SOURCE CATEGORIES

ACTION

- On January 31, 2014, the U.S. Environmental Protection Agency (EPA) promulgated changes to three air toxics standards that cover nine industrial source categories in the chemical manufacturing industry.
- The air toxics standards and sources categories covered under this rule include:
 - Group IV Polymers and Resins (31 active facilities)
 - Current standards issued 09/12/96
 - Facilities manufacture thermoplastic resins, and with two exceptions, use styrene as the dominant feedstock. These thermoplastics are basically intermediate products used to produce automotive plastic parts, appliances and appliance parts, housewares, polyester fibers, packing and containers, soft drink bottles, and toys.
 - Includes the following source categories:
 - Acrylonitrile-Butadiene-Styrene Resin (ABS) Production (5 facilities)
 - Methyl Methacrylate-Acrylonitrile-Butadiene-Styrene Resin (MABS) Production (0 facilities)
 - Methyl Methacrylate-Butadiene-Styrene Resin (MBS) Production (2 facilities)
 - Nitrile Resin Production (0 facilities)
 - Polyethylene Terephthalate Resin (PET) Production (15 facilities)
 - Polystyrene Resin Production (11 facilities)
 - Styrene-Acrylonitrile Resin (SAN) Production (2 facilities)
 - o Pesticide Active Ingredient Production (18 active facilities)
 - Current standards issued 06/23/99
 - Facilities manufacture active ingredients in insecticides, herbicides, fungicides, and related products. Typically, the active ingredients are subsequently formulated with inert ingredients to create end-product pesticides for application.
 - Polyether Polyols Production (23 active facilities)
 - Current standards issued 06/01/99
 - Facilities manufacture chemical products with repeating ether linkages. Polyether polyols do not have significant uses of their own, but are used to make a variety of other products including molded flexible foams, rigid foams, surface coatings, adhesives, sealants, lubricants, degreasing agents, hydraulic fluids, cosmetics, and pharmaceuticals.

REVIEW OF AIR TOXIC STANDARDS

- The EPA conducted the following reviews for each of the source categories included in the final rule:
 - **Technology Review:** To determine if there have been advances in practices, processes or control technologies since the EPA issued the standards.
 - **Residual Risk Assessment:** To determine whether additional emission reductions are warranted to protect public health and the environment.

- The EPA also addressed:
 - **Unregulated Emission Points:** To identify and address significant unregulated emission points.
 - Corrections and Clarifications
 - **Start-up and Shut-down Provisions:** To address the vacatur of the startup, shutdown and malfunction provisions for air toxics standards.

Technology Review

- The Clean Air Act requires the EPA to review and revise air toxics standards, as necessary, taking into account developments in practices, processes and control technologies since issuance of the standards.
- The EPA identified no developments in practices, processes or control technology for any of the three standards. Therefore, the EPA is not revising the existing standards as a result of the technology review.

Residual Risk Assessments

- The Clean Air Act requires the EPA to assess the risk remaining after application of the final air toxic standard. This is known as a residual risk assessment.
- The residual risk assessment includes the following analyses:
 - o estimates of individual source category risk,
 - o risk estimates from all air toxics emissions at a facility ("total facility risk"),
 - o risk estimates based on the actual emissions reported as emitted, and
 - o risk estimates based on emissions allowed by the current air toxics standard.
- The risk assessments found that the air toxics standards for all of these source categories provide an acceptable risk, and that no further risk reduction is required to provide an ample margin of safety to address residual risk. Therefore, the EPA is not revising the existing air toxics standards as a result of the residual risk reviews.
 - For each of these source categories, the cancer risk is no greater than 30-in-1 million. Based on consideration of this risk, as well as other risk considerations, the EPA has determined that the risks are acceptable for all of these source categories.
 - The EPA did not identify any of the controls evaluated in the technology review that would further reduce risks beyond the MACT standards. Therefore, the EPA is concluding that no additional controls are necessary to protect public health with an ample margin of safety.
 - Non-cancer and acute risks to humans, as well as risks to the environment, for these source categories are low.

Start-up, Shutdown, and Malfunction Provisions

- The final amendments eliminate the exemptions to emissions limits and standards during periods of startup, shutdown, and malfunction to ensure the standards are consistent with the District of Columbia Circuit Court's vacatur of similar provisions in other rules.
- The final amendments also require that facilities monitor atmospheric releases from pressure relief devices, as releases from these devices occur as a result of malfunctions.

Unregulated Emission Points

• The EPA is finalizing amendments to establish standards for emissions from previously unregulated emission points in Group IV Polymers and Resins by adding standards limiting emissions from equipment leaks used in a subcategory of the PET source category.

Response to Petition for Reconsideration

• The EPA also is promulgating amendments to address an outstanding petition for reconsideration by finalizing a revised concentration limit for ethylene glycol in the cooling water of process contact cooling towers used in one subcategory of the PET source category in Group IV Polymers and Resins.

Compliance Dates

- The final amendments require facilities to comply immediately with the revised equipment leak, process contact cooling tower, and startup, shutdown, and malfunction revisions.
- The final amendments allow facilities up to 3 years to comply with the new pressure relief device monitoring requirements.

BACKGROUND

- The Clean Air Act requires the EPA to regulate toxic air pollutants, also known as air toxics, from large industrial facilities in two phases.
- The first phase is "technology-based," where the EPA develops standards for controlling the emissions of air toxics from sources in an industry group (or "source category"). These maximum achievable control technology (MACT) standards are based on emissions levels that are already being achieved by the better-controlled and lower-emitting sources in an industry.
- Within 8 years of setting the MACT standards, the Clean Air Act directs the EPA to assess the remaining health risks from each source category to determine whether the MACT standards protect public health with an ample margin of safety and protect against adverse environmental effects. This second phase is a "risk-based" approach called residual risk. Here, the EPA must determine whether more health-protective standards are necessary.
- Also, every 8 years after setting the MACT standards, the Clean Air Act requires that the EPA review and revise the standards, if necessary, to account for improvements in air pollution controls and/or prevention.
- The previously-issued air toxic standards for these three production processes are three of 96 air toxic standards (MACT) that require 174 industry sectors to eliminate 1.7 million tons of 187 toxic air pollutants. Congress listed these toxic air pollutants in the Clean Air Act.

FOR MORE INFORMATION

- Interested parties can download the notice from the EPA's web site at the following address: http://www.epa.gov/ttn/atw/pr4/pr4pg.html.
- Today's final rule and other background information are also available either electronically at http://www.regulations.gov, the EPA's electronic public docket, or in hardcopy at the EPA Docket Center's Public Reading Room.
- The Public Reading Room is located in the EPA Headquarters Library, Room Number 3334 in the EPA West Building, located at 1301 Constitution Avenue, NW, Washington, DC. Hours of operation are 8:30 a.m. to 4:30 p.m. eastern standard time, Monday through Friday, excluding federal holidays.
- Visitors are required to show photographic identification, pass through a metal detector and sign the EPA visitor log. All visitor materials will be processed through an X-ray machine, as well. Visitors will be provided a badge that must be visible at all times.
- Materials for this action can be accessed using Docket ID No. EPA-HQ-OAR-2011-0435.
- For further information contact Nick Parsons of the EPA's Office of Air Quality Planning and Standards by phone at (919) 541-5372 or by e-mail at parsons.nick@epa.gov.