



Ink Products: Jonrez® MR Resin

Overview

Printing ink resins are a core business within Ingevity. For more than six decades, our company has served the graphic arts marketplace with innovations in technology to support our customers' business challenges. We have a diversified product portfolio of rosin-based derivatives that are consistently produced to meet quality requirements for varnish and ink makers throughout the world.

Uses and applications

Jonrez® MR resin is a high-performance metal resinate solution developed for toluene ink systems. It contributes excellent pigment wetting, dilution and gloss to publication gravure inks.

Physical/chemical properties

- Physical state: Flammable liquid. Flashpoint below 73.4 degrees Fahrenheit (23 degrees Celsius) and boiling point above 95 °F (35 °C).
- Color: Amber (dark).
- Odor: Aromatic.

Health effects

The information contained in the table below may be useful for individuals who handle the concentrated resin substance, such as a manufacturer or transporter. Consumers are not likely to come into contact with the concentrated substance. The data, while verifiable, is not intended to be comprehensive nor replace the data found in the safety data sheet (SDS).

Effect Assessment	Result
Acute toxicity	Harmful if swallowed.
Irritation	Causes serious eye irritation and skin irritation.
Toxic to reproduction (unborn child)	Suspected of damaging an unborn child.
Specific target organ toxicity	Narcotic effects with single exposure, may cause drowsiness or dizziness. May cause damage to organs through prolonged or repeated exposure.
Aspiration hazard	Can cause central nervous system (CNS) depression.



Environmental Effects

The information contained in the table below is intended to provide brief and general information of this substance's environmental impact. The data contained in this section explain the relative effect of the concentrated substance on the environment, as defined by certain tests.

Effect Assessment	Result
Aquatic toxicity	Toxic to crustacea. Toxic to fishes. Groundwater pollutant
Persistence and degradability	Not readily biodegradable
Bioaccumulation potential	Low potential to bioaccumulation

Exposure and Risk Management Recommendations

Workplace exposure: Exposure can occur either in a manufacturing facility or in the various industrial or manufacturing facilities that use the product. Those working with the product in manufacturing operations could be exposed during maintenance, sampling, testing, or other procedures. Each manufacturing facility should have a thorough training program for employees and appropriate work processes, as well as safety equipment in place to limit unnecessary exposure. Safety showers and eye-wash stations should be accessible nearby. Workers should use engineering controls and personal protective equipment (PPE) that excludes exposure to the product where possible. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. Use explosion-proof electrical, ventilating, lighting and all material-handling equipment. Use only non-sparking tools. Take precautionary measures against static discharge. Keep container tightly closed. Use only outdoors or in a well-ventilated area. Do not breathe vapor. Do not eat, drink or smoke when using this product. Wash hands thoroughly after handling.

Consumer exposure: This product may cause eye, skin, or respiratory irritation. Avoid direct contact with skin and eyes, wear protective gloves and eye or face protection. If there is any direct contact on skin, wash with plenty of soap and water. Wash contaminated clothing before reuse. If skin irritation or rash occurs, get medical attention. If in eyes, rinse cautiously with water for several minutes. If contact lenses are worn, they should be removed if possible, and rinsing continued. If eye irritation persists, get medical attention.

Environmental exposure: Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. This material and its container must be disposed of in accordance with the environmental laws in your jurisdiction. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally.

Conclusion

Under conditions of normal use by qualified personnel, Jonrez™ MR resin is not expected to pose a significant risk to human health or the environment.