



Lupranate[®] 5143 Isocyanate

Carbodiimide-Modified Isocyanate

Lupranate 5143 isocyanate is a liquid, carbodiimide-modified 4,4'-diphenylmethane diisocyanate. With manufacturing advances, Lupranate 5143 isocyanate achieves better low temperature stability than Lupranate MM103 isocyanate. At the same time, Lupranate 5143 isocyanate offers consistently low color and improved stability in formulated products such as prepolymers and casting kits. Lupranate 5143 isocyanate is a viable alternative to Lupranate MM103 isocyanate in CASE and microcellular urethane applications.

TYPICAL PROPERTIES

Appearance	light yellow liquid
NCO content, wt%	29.2
Viscosity @ 25°C, cps	40
APHA Color, maximum	250
Flash point, °C (COC)	190
Density @25°C, g/cm³	1.22
Initial boiling point, 5mm Hg, °C	190
Vapor Pressure @25°C, mm Hg	< 0.00001
Hydrolyzable chlorides, wt. %	< 0.003%

Storage

Lupranate 5143 isocyanate is supplied in tank trucks, or drums. Once a container has been opened, care should be taken to exclude moisture. The most favorable temperature for storage is 22-30°C. If stored at higher temperatures, or if moisture is not excluded, an undesirable increase in viscosity will occur. Below 20°C solid crystals may form and settle out, which can alter the performance of the product. The solid crystals contain pure MDI and in this solid form may exhibit the same dimerization characteristics as pure MDI. Unless prompt action is taken to melt the product, subsequent dimerization will proceed and may deteriorate the clarity and assay of the product. Melting the crystals is done by rolling the drum in a hot air oven at 80-100°C. The drum contents should not be heated above 70°C to minimize dimer formation.

Warning

Excessive heating or prolonged heating at 80-100°C may cause dangerous pressure build-up. Heating by electrical means is not recommended due to the danger of local overheating, which would result in dimer formation. Melting in a water bath is not recommended because of the potential danger of the isocyanate reacting with water in case of drum leakage. Rolling the drum in atmospheric steam is an alternate procedure that can be used provided care is taken to ensure that the drum does not leak. The shelf life of Lupranate 5143 Isocyanate is six months if the temperature is maintained at 25-35°C and moisture is excluded.

In case of chemical emergency:

Call CHEMTREC 800-424-9300 or BASF (800-832-HELP) day or night for assistance and information concerning spilled material, fire, exposure and other chemical accidents. Outside the U.S., call (703) 527-3887.

Attention:

This product is sold solely for use by industrial institutions. Refer to our Safety Data Sheet (SDS) regarding regulatory compliance, safety, hazards, spill procedures and disposal of this product. An SDS as well as additional information on BASF urethane chemicals may be obtained by telephoning BASF Corporation, Urethane Customer Service at (877) 297-3322 or faxing (734) 324-6866.

Important:

While the descriptions, designs, data and information contained herein are presented in good faith and believed to be accurate, it is provided for your guidance only. Because many factors may affect processing or application/use, we recommend that you make tests to determine the suitability of a product for your particular purpose prior to use. NO WARRANTIES OF ANY KIND, EITHER EXPRESS OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE, ARE MADE REGARDING PRODUCTS DESCRIBED OR DESIGNS, DATA OR INFORMATION SET FORTH, OR THAT THE PRODUCTS, DESIGNS, DATA OR INFORMATION MAY BE USED WITHOUT INFRINGING THE INTELLECTUAL PROPERTY RIGHTS OF OTHERS. IN NO CASE SHALL THE DESCRIPTIONS, INFORMATION, DATA OR DESIGNS PROVIDED BE CONSIDERED A PART OF OUR TERMS AND CONDITIONS OF SALE.

Further, you expressly understand and agree that the descriptions, designs, data, and information furnished by BASF hereunder are provided gratis and BASF assumes no obligation or liability for the description, designs, data and information given or results obtained, all such being given and accepted at your risk.

© BASF Corporation, 2018



BASF Corporation is fully committed to the Responsible Care® initiative in the USA, Canada, and Mexico.

For more information on Responsible Care® go to:

U.S.: www.basf.us/responsiblecare_usa

Canada: www.basf.us/responsiblecare_canada

México: www.basf.us/responsiblecare_mexico

BASF Corporation

1609 Biddle Avenue

Wyandotte, MI 48192

Phone: (734) 324-6100

<https://polyurethanes.basf.us/>