

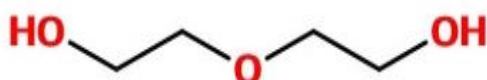
Technical Data Sheet

DIETHYLENE GLYCOL

2,2'-oxybis ethanol (DEG)

CAS Number: **111-46-6**

Formula: C₄H₁₀O₄



DESCRIPTION:

Diethylene glycol is a clear, colorless, low-volatility and hygroscopic liquid, with moderately viscous. It is completely miscible with water and many organic liquids.

APPLICATION:

Diethylene glycol (DEG) is most commonly used as the chemical Intermediate for the production of unsaturated polyester resins, polyester polyol, Thermoplastic polyurethanes, emulsifiers and Morpholine. Moreover, DEG is used in applications which require hygroscopicity, lubricants, and low volatility such as plasticizer, solvent in printing ink, textile lubricant, humectants and dehydrating agents.

PHYSICAL PROPERTIES:

Form	liquid
Appearance	Clear
Molecular Weight	106.12
pH	7
Boiling Point, 760 mm Hg, °C	245
Flash Point, PMCC, °C	143
Melting Point, °C	-10
Specific Gravity, 20/20°C	1.1175
Refractive Index, 20°C	1.4476
Vapor Pressure, mm Hg, 20°C	0.04
Viscosity, cSt, 40°C	13.65
Aldehyde as FA, ppm	0.7
Sodium as Na, ppm	<0.1
Potassium as K, ppm	<0.1
Chloride as Cl, ppm	<0.1

REGULATORY INFORMATION:

IMDG Classification	Non-Dangerous
	Goods
HMIS Code	1-1-0
HS Code	2909.41.00



HANDLING AND STORAGE:

Keep the material in the anhydrous state to prevent severe corrosion to the carbon steel or aluminum tank and related equipment. For longer term color stability, it is recommended that the product be stored under an inert atmosphere.

Diethylene glycol products have 24 months of shelf-life time under unopened drum. The product should be re-evaluated after 24 months to reconfirm the product quality, if properly stored and protected from contamination. For bulk container, the shelf-life time of product is 6 months from manufacturing date.

For storage conditions, product is hygroscopic, water contamination should be avoided. Keep container tightly closed without air contamination. Due to Diethylene glycol is very sensitive with moisture, an elevated moisture level when do re-sampling might be faced. The periods of exposure to high temperatures should be minimized. Avoid directly contact with sunlight and higher temperature. Diethylene glycol is recommended to be stored under an inert atmosphere such as nitrogen blanket to sustain product stability.

PACKAGING:

Product is available in bulk truck, ISO Tank, flexi bag, IBC tank, steel drum with epoxy phenolic coating. Recommended containers are stainless steel and aluminum or carbon steel with suitably lined. IBC tank material should be HDPE with UV stabilized and opaque to prevent UV degradation. Certain government regulations may apply at the time of shipment and delivery.

SAFETY:

Wear appropriate personal protective equipment, including appropriate respiratory protection. Avoid contact with skin, eyes or clothing. For information on the toxicity and handling of this product, please find in the Material Safety Data Sheet.

TERMS & CONDITIONS:

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