

Pour Point Depressant/Dispersant

General Statement

A pour point depressant (PPD) is an additive that lowers the pour point of oils and fuels, preventing them from solidifying or becoming too viscous at low temperatures, ensuring smooth flow and operation.

Chemical Identification

▶ Products Name

MAXDIP-6222HF

▶ Chemical Identity

The pour point depressants commercially employed are Polymer of ester in aromatic solvent (Solvent naphtha (petroleum), heavy aromatic), functional group, Styrene-maleic anhydride copolymers, and their esters.

Uses and Applications

PPD is an additive which, when added to waxy crude oils, acts as wax crystal modifier, prevents the growth of interlocking wax crystals and enables the oils to be pumpable below its normal pour point.

Physical / chemical properties

Property	Value
Appearance above 35 °C	Yellowish Amber viscous Liquid.
Solubility	Soluble in crude oil & common aromatic solvents, insoluble in water.
Viscosity (cps) at 40 °C	< 500cps.
Flash Point	62 °C (Close Cup)

Health Effects

This chemical poses several health hazards, including the potential for aspiration hazard, which can lead to severe respiratory issues if inhaled. It is classified as a carcinogen, indicating it may cause cancer with prolonged or repeated exposure. Additionally, it can cause skin irritation upon contact and has acute oral toxicity, posing significant risks if ingested.

Environmental Effects

This chemical poses a long-term hazard to the aquatic environment, classified under Aquatic Chronic Category. PPD do not bioaccumulate in the water but due to low biodegradation rate it is expected to remain in soil & sediment.

Exposure

▶ Human Health

The product is only used for industrial purposes; therefore, consumer exposure is not relevant and does not need to be assessed for this product. Aromatic solvents (Solvent naphtha (petroleum), heavy arom.) pose several human health hazards, including potential carcinogenicity, reproductive impairments, and immune dysfunctions, with some solvents causing neurological and respiratory problems. For worker, follow appropriate Risk Management Measures to control risk of exposure.

▶ Environment

According to GHS/CLP regulations the Aromatic solvents (Solvent naphtha (petroleum))The solvent of this preparation is relatively volatile and will evaporate from water and soil over the course of a few days. Long term adverse effects to aquatic organisms are possible if continuous exposure is maintained. Expected to be toxic to aquatic organisms.

Risk Management Recommendations

Direct contact with the substance can be practically excluded as the product is handled in close process. All personnel should be adequately trained for general handling of chemicals. Wear appropriate PPEs. Ensure adequate ventilation & observe the usual precautions for handling chemicals. Storage must be in MS metallic vessels. Keep away from heat, Flame, and oxidizing agents. Store in a cool enclosed place. Wash hands & skin following contact. If the product gets into your eyes, rinse eyes thoroughly for 15 minutes with tap water and seek medical attention, consult the doctor immediately.

Accidental Release Measures

▶ Spill Containment

Avoid spills and prevent material from entering water bodies.

▶ Clean-up Procedure




Use protective equipment during clean-up. Dispose of in accordance with local regulation.

Regulatory Information/Classification and Labelling

▶ Regulatory Compliance

Product is compliant with OSHA (US); TSCA and other domestic regulations. Being polymer, this product is exempted from REACH (EU) registration.

Classification and Labelling

GHS/CLP Classification	Flammable Category 4, Carcinogenicity category 2, Skin Irritation category 2, Aspiration Hazard category 1 and Acute Oral toxicity category 4
Hazard Pictogram	  
	GHS08 GHS07 GHS09
Signal Word	Danger
Hazard Statement	H227 Combustible liquid. H302 Harmful if swallowed. H315 Causes skin irritation, H351 Suspected of causing cancer (Inhalation), H304 May be fatal if swallowed and enters airways. H410 Very toxic to aquatic life with long lasting effects.
Precautionary Statements	Keep away from flames and hot surfaces. – No smoking. Avoid breathing dust/fume/gas/mist/vapors/spray Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection. If swallowed: Immediately call a poison center/doctor. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a poison center/doctor if you feel unwell. Store locked up. Dispose of contents/container in accordance with local/regional/national/international regulations.

Conclusion

PPD is a petroleum industrial use that requires safe handling due to its flammable nature. Workers handling this product must use protective gear, and facilities must implement safety protocols to avoid accidents and appropriate Risk Management Measures should be selected and applied to control risk of exposure. Exposure to environment is considered negligible as PPD has supported petroleum industrial uses and the manufacturing process is an enclosed system. Also, this product has no supported uses in direct consumer products.

Contact Information Within Company

M/s. Thermax Limited, Chemical Division, 97-E, General Block, MIDC Industrial Area, Bhosari, Pune 411 026 [India]
Tel: 00 91 20 67156900/ 91 20 67156901, Off. No.: +91 20 67156900/6901