Chem-Impex International, Inc.

Tel: (630) 766-2112 E-mail: sales@chemimpex.com Shipping and Correspondence: 935 Dillon Drive Wood Dale, IL 60191 Fax: (630) 766-2218 Web site: www.chemimpex.com Manufacturing site: 825 Dillon Drive Wood Dale, IL 60191

Certificate of Analysis

Lot Number001684-20170422 D-Mannitol diacetonideD-Mannitol diacetonide1,2:5,6-diacetone-D-mannitolCAS Number Molecular Formula1707-77-3 C12H22O6Molecular Weight262.3AppearanceWhite crystalline powder	Catalogue Number Product	1,2:5,6-Di-O-isopropylidene-D-mannitol
1,2:5,6-diacetone-D-mannitolCAS Number1707-77-3Molecular FormulaC12H22O6Molecular Weight262.3	Lot Number	001684-20170422
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Molecular FormulaC12H22O6Molecular Weight262.3		1,2:5,6-diacetone-D-mannitol
Molecular Weight 262.3	CAS Number	1707-77-3
	Molecular Formula	$C_{12}H_{22}O_6$
Appearance White crystalline powder	Molecular Weight	262.3
	Appearance	White crystalline powder
Solubility Soluble in water and CHCl3. Insoluble in petroleum.	Solubility	Soluble in water and CHCl3. Insoluble in petroleum.
Melting Point 110-120 °C	Melting Point	110-120 °C
Heavy Metals < 20 ppm	Heavy Metals	< 20 ppm
Optical Rotation $[a]_D = +6.3^\circ (C=5 \text{ in CHCl}_3)$	Optical Rotation	$[a]_D = +6.3^{\circ} (C=5 \text{ in } CHCl_3)$
Analysis by Mass Spectra Conforms to standard	Analysis by Mass Spectra	Conforms to standard
Loss on Drying < 0.5%	Loss on Drying	< 0.5%
Residue On Ignition 0.05%	Residue On Ignition	0.05%
¹ H NMR Conforms to structure	¹ H NMR	Conforms to structure
Purity by GC 98.4%	Purity by GC	98.4%
Purity by TLC One spot	Purity by TLC	One spot
Storage Store at 0-8 °C	Storage	Store at 0-8 °C

Certificate of Analysis

Catalog Number: 21817

Lot Number: 001684-20170422

Remarks

See material safety data sheet for additional information

For laboratory use only

The foregoing is a copy of the Certificate of Analysis as provided by our supplier

letumer.

Bala Kumar Quality Control Manager