NMP (1-Methyl-2-pyrrolidinone) ALEG®

Positive Photoresist Stripper



Material No.: 6397-05 Batch No.: 0000188339

Manufactured Date: 2017/10/29 Retest Date: 2022/10/28

## Certificate of Analysis

Test	Specification	Result
Assay (C <sub>5</sub> H <sub>9</sub> NO)	>= 99.5 %	100.0
Color (APHA)	<= 20	<5
Water (H2O)(by Karl Fischer titrn)	<= 0.05 %	0.04
Free Amines (as CH3NH2)	<= 50 ppm	< 1
Chloride (Cl)	<= 0.5 ppm	< 0.5
Phosphate (PO <sub>4</sub> )	<= 1 ppm	< 1
Trace Impurities – Aluminum (Al)	<= 100.0 ppb	1.0
Arsenic and Antimony (as As)	<= 100 ppb	< 10
Trace Impurities – Barium (Ba)	<= 100.0 ppb	< 0.5
Trace Impurities – Boron (B)	<= 100.0 ppb	< 2.0
Trace Impurities - Calcium (Ca)	<= 300.0 ppb	34.0
Trace Impurities - Chromium (Cr)	<= 100.0 ppb	< 1.0
Trace Impurities - Cobalt (Co)	<= 100.0 ppb	< 1.0
Trace Impurities - Copper (Cu)	<= 100.0 ppb	2.0
Trace Impurities - Gold (Au)	<= 100.0 ppb	< 0.5
Trace Impurities - Iron (Fe)	<= 100.0 ppb	1.0
Trace Impurities - Lead (Pb)	<= 100.0 ppb	< 3.0
Trace Impurities - Lithium (Li)	<= 100.0 ppb	< 0.5
Trace Impurities - Magnesium (Mg)	<= 100.0 ppb	0.6
Trace Impurities - Manganese (Mn)	<= 100.0 ppb	< 1.0
Trace Impurities - Nickel (Ni)	<= 100.0 ppb	< 1.0
Trace Impurities – Potassium (K)	<= 100.0 ppb	< 4.0
Trace Impurities - Silver (Ag)	<= 100.0 ppb	< 1.0
Trace Impurities – Sodium (Na)	<= 300.0 ppb	2.0

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Test	Specification	Result
Trace Impurities - Strontium (Sr)	<= 100.0 ppb	< 0.5
Trace Impurities - Tin (Sn)	<= 100.0 ppb	< 2.0
Trace Impurities - Titanium (Ti)	<= 100.0 ppb	< 1.0
Trace Impurities - Vanadium (V)	<= 100.0 ppb	< 0.5
Trace Impurities - Zinc (Zn)	<= 100.0 ppb	2.0
Particle Count – 1.0 µm and greater (Rion KS42AF)	<= 10 par/ml	2

For Microelectronic Use

Country of Origin: US

Packaging Site: Phillipsburg Mfg Ctr & DC



Phillipsburg, NJ 9001:2008, 14001:2004, FSSC 22000
Paris, KY 9001:2008
Mexico City, Mexico 9001:2008
Deventer, The Netherlands 9001:2008, 14001:2004, 13485:2003
Gliwice, Poland 9001:2008, 13485:2012
Selangor, Malaysia 9001:2008
Dehradun, India, 9001:2008, 14001:2004, 13485:2003
Mumbai, India, 9001:2008
Panoli, India 9001:2008

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Vice President Global Quality