



**ChemPure* Brand
Chemicals**

July 30, 2019

CERIFICATE OF ANALYSIS

...Pure Quality

Product Name:	FORMIC ACID	LC-MS GRADE, ULTRAPURE
Product Number:	CP-V9623, CP-L9623	Formula: HCOOH
CAS Number:	64-18-6	Formula Weight: 46.03 G/MOL
Lot Number:	CCHG4016	Storage: Room Temp
Manufactured Date:	July 30, 2019	MDL: MFCD00003297
Retest Date:	July 31, 2021	

	Specifications	Results
Appearance:	Clear Liquid	Clear Liquid
Purity:	≥ 99 %	99.7 %
Evaporative Residue:	≤ 0.005 %	≤ 0.005 %
Color Test:	≤ 10 APHA	≤ 10 APHA
Assay:	Must Pass	Passes
Refractive Index (20°C, 589 nm):	1.3700 to 1.3720	1.3709
Infrared Spectrometry:	Must Conform	Conforms to Reference
Chlorides (Cl)	≤ 5 ppm	≤ 5 ppm
Sulfites (SO ₃)	≤ 20 ppm	≤ 20 ppm
Sulfates (SO ₄)	≤ 50 ppm	≤ 50 ppm
Lead (Pb)	≤ 0.1 ppm	≤ 0.1 ppm
Copper (Cu)	≤ 0.1 ppm	≤ 0.1 ppm
Cadmium(Cd)	≤ 0.1 ppm	≤ 0.1 ppm
Iron (Fe)	≤ 2 ppm	≤ 2 ppm

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It is certified that the above copy is a true copy of the actual lot analysis from the manufacturer.

Vyto Mekesa, QC Director

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