

ALADDIN SCIENTIFIC CORPORATION

14078 Meridian Parkway, Riverside, CA. 92518

Certificate of Analysis

Date of Testing: 2025-04-22 15:50:37

Date of Next Testing: 2029-04-21 15:50:37

Product Name: **4-(2-Hydroxyethyl)morpholine**

CAS Number: 622-40-2

Specifications & Purity: $\geq 99\%$

Lot #: D2518319

SKU #: **H100457**

Version: **1**

Analysis #: **393183**

Storage Temperature: Store at 2-8°C, Argon charged

Parameter	Limit Values	Result
Water by Karl Fischer	0-0.5 (%)	0.23 %
Refractive index n _{20/D}	1.476-1.479	1.48
Specific gravity	1.07-1.075	1.07
Purity(GC)	99-100 (%)	99.16 %
Appearance (H100457)	colorless to brown liquid	colorless to brown liquid
Proton NMR spectrum	Conforms to Structure	Conforms to Structure

A handwritten signature in black ink that reads "John Su".

John Su
QA & QC Manager