

BIOBUFFER SOLUTIONS

100 Majestic Way, Bangor, PA 18013 / www.biospectra.us

Effective Date:	13-May-2025	13-May-2028	: Date of Next Review
Prepared By:	Amy Yenko	Not Applicable	: Supersedes
QA/QC Approval:	Krista Rehrig	Carissa Albert	: Management Approval
Reason for Revision:	See Revision History in MasterControl.		

CERTIFICATE OF ANALYSIS

TRIS

ACS, BIOTECH

BIO ULTRA GRADE / TRIS-5222

LOT: TRIS-L02-0725-0187

$\text{NH}_2\text{C}(\text{CH}_2\text{OH})_3$ * F.W. 121.14 g/mol * CAS#: 77-86-1

Manufacturing Date: 05/02/24 Retest Date: 05/31/26

Packaging Site: 100 Majestic Way, Bangor PA, 18013

ANALYSIS	SPECIFICATION	TEST RESULT
Absorbance (40%)	290nm	< = 0.2 a.u.
Appearance and Color	White Crystalline Powder	0.069 a.u.
Assay, Dried Basis	99.8-100.1%	White Crystalline Powder
Heavy Metals (as Pb)	< = 5 ppm	100.02 %
Insoluble Matter	< = 0.005%	< = 5 ppm
Iron (Fe)	< = 5 ppm	< = 0.005 %
pH (5%)	10.0 – 11.5	< = 5 ppm
Water, KF	< = 1.0 %	10.84
		0.12 %

INTENDED USE: Material represented by this Certificate of Analysis is suitable for use as a process chemical. The material represented by this Certificate of Analysis is not suitable to be used as an Excipient, Active Pharmaceutical Ingredient, Drug, Drug Product or Household Item.

MANUFACTURING DATE: The manufacturing date is representative of the date of final packaging at BioSpectra, Inc.

Prepared by: Amel McCall Date: 7/21/25 Job Title: QA Tech III

Reviewed by: Car Albert Date: 7/21/25 Job Title: Senior Quality Manager