BIOBUFFER SOLUTIONS

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

Effective Date:	09-Nov-2026	09-Nov-2029	: Date of Next Review
Prepared By:	Amy Yencho	BSI-COA-0345 v.1.0	: Supersedes
QA/QC Approval:	Emily Gibbons	Hannah Kuchmas	: Management Approval
Reason for Revision:	See Revision History in MasterControl.		

CERTIFICATE OF ANALYSIS

TRIS

BIO QUALIFIED GRADE / TRIS-6201

LOT: TRIS-L02-1126-0123

$NH_2C(CH_2OH)_3$ ⅄ F.W. 121.14 g/mol. ⅄ CAS# 77-86-1

Manufacturing Date: 11/14/26 Retest Date: 11/30/28

Packaging Site: 100 Majestic Way, Bangor PA, 18013

Meets USP, EP Specifications

ANALYSIS		SPECIFICATION	TEST RESULT
Absorbance (40%)	290 nm	< = 0.2 a.u.	<0.2 a.u.
Appearance and Color		White Crystalline Powder	Passes Test
Appearance of Solution		Passes Test	Passes Test
Assay, Dried Basis		99.5 – 101.0 %	99.9 %
Chloride		< = 100 ppm	<100 ppm
Identification, IR (USP-A/EP-C)		Conforms to Reference Standard	Passes Test
Identification A (EP), pH (5%) (USP/EP)		10.0 – 11.5	11.0
Identification B (USP)		Passes Test	Passes Test
Identification B (EP), Melting Range (USP)		168 – 172°C	170-171 °C
Identification C (USP)		Passes Test	Passes Test
Identification D (EP)		Conforms to Reference Standard	Passes Test
Insoluble Matter		< = 0.005 %	0.005 %
Loss on Drying		< = 0.5 %	<0.5 %
Related Substances		< = 1.0 %	<0.03 %
Residue on Ignition/Sulfated Ash		< = 0.1%	<0.1 %
Trace Metals	Iron (Fe)	< = 10 ppm	<0.20 ppm
	Lead (Pb)	< = 10 ppm	<0.005 ppm
Water, KF		< = 0.3 %	0.1 %

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COUNTRY OF ORIGIN: China

TEST METHOD REFERENCE: DCN: BSI-ATM-0154

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

INTENDED USE: Material represented by this Certificate of Analysis is suitable for use as a process chemical. It is manufactured in accordance with an ISO Certified Quality Management System. The material represented by this Certificate of Analysis is not suitable to be used as an Active Pharmaceutical Ingredient, Drug, Drug Product or Household Item.

Prepared by: _____ Date: 11/19/26 Job Title: QA Supervisor

Reviewed by: _____ Date: 11/19/26 Job Title: QA Tech III

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