

Analytical Standard Certificate of Analysis

0.5µg/mL Aflatoxin M1

2mL Calibrant of Aflatoxin M1 at 0.5µg/mL in Acetonitrile

Product Code	TSL-143-2
Lot Number	250502-26007
Expiration Date	May 7, 2027
Volume	2.0mL
Solvent	Acetonitrile
Purity	≥ 98.0%
Storage	≤ 8°C

Assigned Values & Uncertainties

Compound: Aflatoxin M1

Mass Concentration

Assigned Value: 0.51µg/mL

Uncertainty:* ± 0.04µg/mL

*Expanded uncertainty at a 95% confidence level (k = 2). All calculations of expanded uncertainty are based on the criteria outlined in the JCGM 100:2008; Guide to the Expression of Uncertainty in Measurement.



Quality Guarantee

This certificate of analysis verifies the analytical standard passes Trilogy Analytical Laboratory's quality control specifications and is released for distribution.

The document has been electronically signed.



Craig Humphrey

Chemistry Production Manager

Date: January 7, 2026

Intended Use

Analytical Standards can be used for verification of laboratory performance, matrix fortification, method development and optimization, calibration curves, trouble shooting, method validation, and calculating recovery corrections for the analysis of mycotoxins by HPLC, GC, MS, MSMS, or TLC.

Instructions for Use

Use the assigned value provided on the certificate of analysis to calculate the volumes of standard needed to perform the function in which you desire. It is important to note, that if diluting Trilogy Analytical Standards for use as calibrants, that fresh standard dilutions be made daily. Please feel free to contact Trilogy Analytical Laboratory for any assistance needed pertaining to calculations or use.

For **dried (insitu) Analytical Standards**, reconstitute with a class A volumetric pipette using the recommended compatible solvent system indicated on the solvent specification of the product details. Verify HPLC grade or equivalent to higher purity is used in the reconstitution process. Final reconstituted volume is provided as the volume on the product details section and should be the solvent volume used for reconstitution. Recommended temperature for reconstitution is 23°C (\pm 2°C). Replace the screw cap on the vial and vortex for a minimum of 30 seconds to complete the reconstitution process.

For measurements that require a fully integrated uncertainty, the provided uncertainty should be expanded to include the uncertainty associated with the user's reconstitution process.

Safety Precautions

Good laboratory practices should be observed while handling all Trilogy Analytical Standards. Follow the recommended precautionary measures (OSHA 29 CFR 1910.1450) for handling chemicals and powders. Avoid contact with eyes, skin, and clothing. Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits. For specific product Safety Data Sheets contact Trilogy Analytical Laboratory.



Trilogy analytical standards are manufactured under an ISO:9001 Quality Management System.



All analytical standards are tested and validated by an ISO:17025 accredited laboratory.



Trilogy Analytical Standards are for laboratory use only. Trilogy does not make any warranties, expressed or implied, in connection to Analytical Standards other than the product meets the quality control specifications at Trilogy Analytical Laboratory. Trilogy Analytical Standards are to be used at the purchaser's discretion. In no way, does Trilogy accept responsibility for the use or work performed by the purchaser.

This product is an Analytical Standard, not a Certified Reference Material under the Trilogy ISO 17034:2016 scope of accreditation.



Questions about Analytical Standards? Talk to Trilogy's experts.

Contact us, please visit trilogylab.com/pages/contact-us.