

Abrin Toxin (A Subunit) from *Abrus precatorius* Seeds

Catalog No. NR-43945

This reagent is the tangible property of the U.S. Government.

Product Description: NR-43945 is a preparation of the A subunit of abrin toxin from *Abrus precatorius* (*A. precatorius*) seeds. The A subunit was separated from the B subunit by galactose affinity chromatography and has a molecular weight of approximately 28,000 daltons. This preparation contains a mixture of abrin isotypes.

Lot¹: 61683448

Manufacturing Date: 26MAR2014

TEST	SPECIFICATIONS	RESULTS
Appearance	Clear and colorless	Clear and colorless
SDS-PAGE (SYPRO Orange Densitometer Scan)	Protein band of interest represents > 95% of total staining intensity above background	Protein band of interest represents > 95% of total staining intensity (Figure 1) ²
SELDI-TOF Mass Spectrometry	Measured mass within 5% of expected mass: 28098 daltons	Measured mass: 28.15 kDa Theoretical mass: 28.1 kDa Percent difference: 0.2%
SELDI-TOF Mass Spectrometry of Lys-C Proteolysis Products	> 50% of total residues accounted for in peptides of expected mass	76% of total residues accounted for in peptides of expected mass
Concentration by Bicinchoninic Acid Protein Assay	Report results	0.1 mg per mL
Functional Activity by Western Blot Abrin toxin subunit A ³ Carbonic anhydrase	Reactive Not reactive	Reactive (Figure 2) Not reactive (Figure 2)
Cytotoxicity Vero cell cytotoxicity	Report results	Cytotoxicity reduced by >3 logs compared to active toxin
Sterility	0.22 µm filter sterilized	0.22 µm filter sterilized
Absorbance Ratio (OD ₂₈₀ /OD ₂₆₀)	Report results	2.0
Endotoxin Content	Report results	< 250 EU per mg

¹NR-43945 was prepared and tested by Uniformed Services University of the Health Sciences, Bethesda, Maryland, USA.

²The A subunit of Abrin toxin band on the SDS-PAGE suggests a higher molecular weight than was determined for this subunit.

³The western blot was done using rabbit anti-Ricin polyclonal antibody (BEI Resources NR-862) primary antibody, which is known to react with abrin toxin.

Date: 26 JUN 2015

Signature: 

BEI Resources Authentication

ATCC®, on behalf of BEI Resources, hereby represents and warrants that the material provided under this certificate has been subjected by the contractor to the tests and procedures specified and that the results described, along with any other data provided in this certificate, are true and accurate to the best of ATCC®'s knowledge.

ATCC® is a trademark of the American Type Culture Collection.
You are authorized to use this product for research use only. It is not intended for human use.



Figure 1: SDS-PAGE

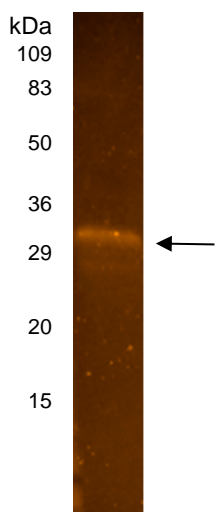
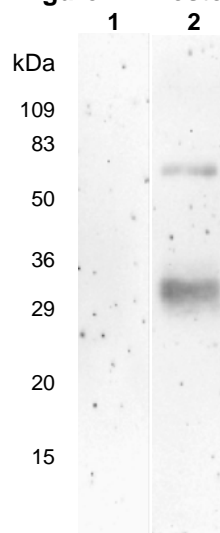


Figure 2: Western Blot



Lane 1: Carbonic anhydrase negative control
Lane 2: NR-43945