



Recombinant Clostridium botulinum Botulinum neurotoxin type A (botA), partial

Product Code	CSB-EP320799CLQ
Relevance	Inhibits acetylcholine release. The botulinum toxin binds with high affinity to peripheral neuronal presynaptic mbrane to the secretory vesicle protein SV2. It binds directly to the largest luminal loop of SV2A, SV2B and SV2C. It is then internalized by receptor-mediated endocytosis. The C-terminus of the heavy chain (H) is responsible for the adherence of the toxin to the cell surface while the N-terminus mediates transport of the light chain from the endocytic vesicle to the cytosol. After translocation, the light chain (L) hydrolyzes the 197-Gln- -Arg-198 bond in SNAP-25, thereby blocking neurotransmitter release. Inhibition of acetylcholine release results in flaccid paralysis, with frequent heart or respiratory failure.
Storage	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.
Uniprot No.	P0DPI0
Alias	Bontoxilysin-A ;BOTOX
Product Type	Recombinant Protein
Immunogen Species	Clostridium botulinum
Purity	Greater than 90% as determined by SDS-PAGE.
Sequence	MPFVNKQFNYKDPVNGVDIAYIKIPNVGQMGPVKAFKIHNKIWWVIPERDTFTNP EEGDLNPPPEAKQVPVSYDSTYLSTDNEKDNYLKGVTCLFERIYSTDLGRML LTSIVRGIPFWGGSTIDTELKVIDTNCINVIQPDGSYRSEELNLVIIGPSADIIQFE CKSFGHEVLNLTRNGYGSTQYIRFSPDFTFGFEESLEVDTNPLLGAGKFATDP AVTLAHELHAGHRLYGIAINPNRVFKVNTNAYYEMSGLEVSFEELRTFGGHDA KFIDSLQENEFRLYYYNKFKDIASTLNKAKSIVGTTASLQYMKNVFKKEYLLSED TSGKFSVDKLFKLYKMLTEIYTEDNFVKFFKVLNRKTYLNFDKAVFKINIVPK VNYTIYDGFNLNRNTNLAANFNGQNTTEINNMNFTKLKNFTGLFEFYKLLCVRGIIT
Lead Time	3-7 business days
Source	E.coli
Gene Names	botA
Expression Region	1-436aa
Notes	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
Tag Info	N-terminal 6xHis-SUMO-tagged
Mol. Weight	66.0kDa

