Recombinant Apis Mellifera Phospholipase A2/Api m1

Catalog # FL011

Product Specifications

Appearance	Sterile filtered White lyophilized (freeze-dried) powder.
Purity	> 97% by SDS-PAGE or HPLC.
Endotoxin	< 0.01 EU/μg of rApi m1 protein as determined by LAL method.
Expression System	Expressed in E. coli.
Tag	Tag free.
Activity	Strong Reactivity to honeybee stung positive serum by IGEs test.
Formulation	Lyophilized from a 0.2 μm filtered concentrated solution in 20 mM PB, with 150 mM NaCl, pH 7.4.
Reconstitution	Before use this product, please read the direction below carefully. This vial must be briefly centrifuged prior to opening to bring the contents to the bottom. Reconstitute in a sterile distilled water or aqueous buffer containing 0.1% BSA to a concentration of 0.1-1.0 mg/ml. Stock solutions should be apportioned into working aliquots and stored at ≤ -20°C. Further dilutions should be made in appropriate buffered solutions.
Accession #	P00630 Ile34-Tyr167
Amino acid sequence	IIYPGTLWCGHGNKSSGPNELGRFKHTDACCRTHDMCPDVMSAGESKHGLTNTASHTRLSCDCDDKFYDCLKNSADTISSY FVGKMYFNLIDTKCYKLEHPVTGCGERTEGRCLHYTVDKSKPKVYQWFDLRKY
Molecular weight	Approximately 15.2 kDa, a single non-glycosylated polypeptide chain containing 134 amino acids.
Synonyms	PLA2
Stability & Storage	Shipped on wet ice. For long term storage, the product should be stored ≤ -20°C. Please avoid repeated freeze-thaw cycles afte r reconstitution. 36 months from date of receipt, -20 to -70°C as supplied. 1 month, 2 to 8°C under sterile conditions after reco nstitution. 3 months, -20 to -70°C under sterile conditions after reconstitution.
Precautions	Recombinant Apis Mellifera Phospholipase A2/Api m1 is for research use only and not for use in diagnostic or therapeutic proce dures.

Background

Api m1, a glycoprotein of the phospholipase 2 (PLA2) family, is a major allergen of Apis mellifera (honeybee) venom (HBV) and a marker allergen for genuine sensitization to this venom. Api m 1 contributes 12-16% of venom dry weight. Api m 1 is consist ently found as a major allergen in HBV-allergic patients. Of the 12 known allergens within HBV, Api m 1 is considered the most prominent allergen, in terms of prevalence of sensitization, levels of specific IgE to Api m 1, and quantitative correlation betwee n Api m 1 and HBV specific IgE. Api m 1 does not cross-react with phospholipases of the PLA1 family found in Vespid venom s, therefore, Api m 1 is a marker allergen allowing to discriminate between HBV and Vespid venom sensitization. Recombinant Api m1 is a 15.2kDa globular protein containing 134 amino acid residues.