Recombinant Protein Technical Manual

Recombinant Mouse PLA2G12B/PLA2G13 Protein (His Tag)

RPES0235

Product Data:

Product SKU: RPES0235

Size: 20µg

Species: Mouse

Expression host: HEK293 Cells

Uniprot: NP_076019.2

Protein Information:

Molecular Mass: 21 kDa

AP Molecular Mass: 24 kDa

Tag: C-His

Bio-activity:

Purity: > 95 % as determined by SDS-PAGE

Endotoxin: < 1.0 EU per µg of the protein as determined by the LAL method.

Storage: Lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8℃ for 2-7 days. Aliquots of reconstituted samples are stable at < -20℃ for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from sterile 20mM NaAc, 100mM NaCl, pH 5.0

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: 2010002E04Rik;Fksg71;hlb218;Pla2g13

Immunogen Information:

Sequence: Met 1-Leu 195

Background:

Group XIIB secretory phospholipase A2-like protein, also known as Group XIII secretory phospholipase A2-like protein, GXIII sPLA2-like, sPLA2-GXIIB, GXIIB, PLA2G13 and PLA2G12B, is a secreted protein which belongs to the phospholipase A2 family. PLA2G12B / PLA2G13 is strong expression in liver, small intestine and kidney. Mammalian secretory phospholipase A2s (sPLA2s) form a family of structurally related enzymes that are involved in a variety of physiological and pathological processes via the release of arachidonic acid from membrane phospholipids or the binding to specific membrane receptors. Phospholipases A2 / PLA2 are enzymes that release fatty acids from the second carbon group of glycerol. This particular phospholipase specifically recognizes the sn-2 acyl bond of phospholipids and catalytically hydrolyzes the bond releasing arachidonic acid and lysophospholipids. Phospholipases A2 / PLA2 are commonly found in mammalian tissues as well as insect and snake venom. Venom from both snakes and insects is largely composed of melittin, which is a stimulant of Phospholipases A2 / PLA2. Due to the increased presence and activity of Phospholipases A2 / PLA2 resulting from a snake or insect bite, arachidonic acid is released from the phospholipid membrane disproportionately. As a result, inflammation and pain occur at the site.