

Recombinant Human PVRL1/NECTIN1/CD111 Protein(His Tag)

Catalog Number: GPMH0414

Note: Centrifuge before opening to ensure complete recovery of vial contents.

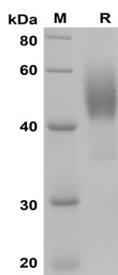
Description

Species	Human
Source	HEK293 Cells-derived Human PVRL1 protein Met1-Thr334, with an C-terminal His
Calculated MW	36.6 kDa
Observed MW	40-60 kDa
Accession	Q15223
Bio-activity	Not validated for activity

Properties

Purity	> 90% as determined by reducing SDS-PAGE.
Endotoxin	< 1.0 EU/mg of the protein as determined by the LAL method
Storage	Generally, 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°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with 5% Trehalose and 5% Mannitol.
Reconstitution	It is recommended that sterile water be added to the vial to prepare a stock solution of 0.5 mg/mL. Concentration is measured by UV-Vis.

Data



SDS-PAGE analysis of Human PVRL1/NECTIN1/CD111 proteins, 2µg/lane of Recombinant Human PVRL1/NECTIN1/CD111 proteins was resolved with SDS-PAGE under reducing conditions, showing bands at 40-60 KD.

Background

Nectin-1 is a type I transmembrane glycoprotein belonging to the Ig superfamily. Nectin-1 promotes cell-cell contacts by forming homophilic or heterophilic trans-dimers. Heterophilic interactions have been detected between Nectin-1 and Nectin-3 and between Nectin-1 and Nectin-4. Nectin ECDs contain three Ig like domains: an N terminal V type that mediates ligand binding, and two C2 type. Nectin-1 binds viral Glycoprotein D to mediate Herpesvirus (but not Poxvirus) entry into vaginal mucosa, sensory neurons and fibroblasts. In forming adherens junctions and synapses, Nectin-1 and Nectin-3 initiate cell-cell interactions, recruiting $\alpha\beta3$ integrin extracellularly and cadherins intracellularly through afadin and other junctional proteins. These interactions organize the cytoskeleton, strengthen attachment to basement membrane and promote further cell-cell connections. Nectin-1 and Nectin-3 have been found to localize assymmetrically along the chemical synapse, with Nectin-1 primarily on the axonal side and Nectin-3 on the dendritic side. Deficiency of Nectin-1 can result in cleft lip/palate ectodermal dysplasia. Nectin-1 downregulation in epithelial cancers is mediated in part by ectodomain shedding, but it may contribute to invasiveness.