

Product Data Sheet

Basigin/CD147 Protein, Mouse (HEK293, His-Fc)

Cat. No.:	HY-P75480
Synonyms:	Basigin; HT7 antigen; Membrane glycoprotein gp42; Bsg
Species:	Mouse
Source:	HEK293
Accession:	P18572-2 (A22-R209)
Gene ID:	12215
Molecular Weight:	60-70 kDa

PROPERTIES	
FROFERIES	
Appearance	Lyophilized powder.
Formulation	Lyophilized from a 0.2 µm filtered solution of PBS, pH 7.4. Normally 5 % - 8 % trehalose, mannitol and 0.01% Tween 80 are added as protectants before lyophilization.
Endotoxin Level	<1 EU/µg, determined by LAL method.
Reconsititution	It is not recommended to reconstitute to a concentration less than 100 $\mu g/mL$ in ddH_2O.
Storage & Stability	Stored at -20°C for 2 years. After reconstitution, it is stable at 4°C for 1 week or -20°C for longer (with carrier protein). It is recommended to freeze aliquots at -20°C or -80°C for extended storage.
Shipping	Room temperature in continental US; may vary elsewhere.

DESCRIPTION

Background	Basigin/CD147 protein is indispensable for normal retinal maturation and development, acting as a crucial cell surface receptor for NXNL1 and contributing significantly to NXNL1-mediated survival of retinal cone photoreceptors. In collaboration with the glucose transporter SLC16A1/GLUT1 and NXNL1, Basigin/CD147 promotes retinal cone survival by enhancing aerobic glycolysis and facilitating the entry of glucose into photoreceptors. It serves as a signaling receptor for cyclophilins, playing an essential role in PPIA/CYPA and PPIB/CYPB-dependent signaling related to the chemotaxis and adhesion of immune cells. Additionally, Basigin/CD147 is pivotal in targeting the monocarboxylate transporters SLC16A1, SLC16A3, and SLC16A8 to the plasma membrane. Acting as a coreceptor for vascular endothelial growth factor receptor 2 (KDR/VEGFR2) in endothelial cells, it enhances VEGFA-mediated activation and downstream signaling, promoting angiogenesis through EPAS1/HIF2A-mediated up-regulation of VEGFA and KDR/VEGFR2. Moreover, Basigin/CD147 plays a crucial role in spermatogenesis, mediating interactions between germ cells and Sertoli cells and proving essential for the development and differentiation of germ cells into round spermatids.

Caution: Product has not been fully validated for medical applications. For research use only.

 Tel: 609-228-6898
 Fax: 609-228-5909
 E-mail: tech@MedChemExpress.com

 Address: 1 Deer Park Dr, Suite Q, Monmouth Junction, NJ 08852, USA