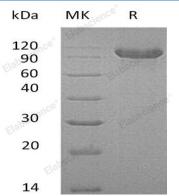
## Recombinant Human Cadherin-16/CDH16 Protein (His Tag)

## Catalog Number: PKSH032138

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

Description	
Species	Human
Source	HEK293 Cells-derived Human Cadherin-16;CDH16 protein Pro18-Ala786, with an C-
	terminal His
Calculated MW	84.4 kDa
Observed MW	90-115 kDa
Accession	O75309
Bio-activity	Not validated for activity
Properties	
Purity	> 76 % as determined by reducing SDS-PAGE.
Endotoxin	< 1.0 EU per µg 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 $< -20^{\circ}C$ 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 of 20mM PB, 150mM NaCl, pH 7.4.
	Normally 5% - 8% trehalose, mannitol and 0.01% Tween 80 are added as protectants
	before lyophilization.
	Please refer to the specific buffer information in the printed manual.
Reconstitution	Please refer to the printed manual for detailed information.

Data



> 76 % as determined by reducing SDS-PAGE.

Background

## **Elabscience**®

Cadherin-16(CDH16) is a single-pass type I membrane protein which contains six cadherin domains. Mature cadherin proteins consist of a large N-terminal extracellular domain, a single membrane-spanning domain, and a small highly conserved C-terminal cytoplasmic domain. Cadherins are calcium-dependent cell adhesion proteins and may contribute to the sorting of heterogeneous cell types. They preferentially interact with themselves in a homophilic manner in connecting cells. Three calcium ions are usually bound at the interface of each cadherin domain and rigidify the connections, imparting a strong curvature to the full-length ectodomain. CDH16 is exclusively expressed in kidney, where the protein functions as the principal mediator of homotypic cellular recognition. It plays a role in the morphogenic direction of tissue development. CDH16 is composed of an extracellular domain containing 6 cadherin domains, a transmembrane region and a truncated cytoplasmic domain. However, it lacks the prosequence and tripeptide HAV adhesion recognition sequence typical of most classical cadherins.