



# Recombinant Protein Technical Manual

## Recombinant Human Cadherin-6/CDH6 Protein (His Tag)

RPES4475

### Product Data:

**Product SKU:** RPES4475

**Size:** 10µg

**Species:** Human

**Expression host:** Human Cells

**Uniprot:** AAH00019.1

### Protein Information:

**Molecular Mass:** 67.4 kDa

**AP Molecular Mass:** 109 kDa

**Tag:** C-6His

**Bio-activity:**

**Purity:** > 90 % as determined by reducing SDS-PAGE.

**Endotoxin:** < 1.0 EU per µg 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°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 of 20mM PB, 150mM NaCl, pH 7.2.

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

**Application:**

**Synonyms:** Cadherin-6; Kidney Cadherin; K-Cadherin; CDH6; KCAD

## Immunogen Information:

**Sequence:** Thr 22-Ala615

## Background:

Cadherin-6 (CDH6) is a type-II classic cadherin cell-cell adhesion molecules, which are expressed in graded or areal patterns, as well as layer-specific patterns, in the cortical plate. Human Cadherin-6 is synthesized as a 790 aa type I transmembrane glycoprotein that contains a 18 aa signal peptide, a 35 aa propeptide, a 562 aa extracellular region, a 21 aa transmembrane segment, and a 154 aa cytoplasmic domain. There are five cadherin domains of approximately 110 aa each in the extracellular region. Cadherin-6 has high expression in kidney, brain, and cerebellum, and may contribute to the formation of the segmental structure of the early brain, as well as the development of renal proximal tubules. Weak expression is also detected in lung, pancreas, gastric mucosa and cytotrophoblasts. As a classic cadherin, Cadherin-6 will form homodimers and promote intercellular adhesion with itself and, possibly, Cadherin-9 and 4.