



Recombinant Protein Technical Manual

Recombinant Human TWF1/Twinfilin Protein (His & GST Tag)
RPES0661

Product Data:

Product SKU: RPES0661

Size: 20µg

Species: Human

Expression host: E. coli

Uniprot: Q12792-4

Protein Information:

Molecular Mass: 57 kDa

AP Molecular Mass: 50 kDa

Tag: N-His & GST

Bio-activity:

Purity: > 84 % as determined by reducing SDS-PAGE.

Endotoxin: Please contact us for more information.

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 sterile 50mM Tris, 500mM NaCl, pH 8.0

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

Application:

Synonyms: A6;MGC23788;MGC41876;PTK9

Immunogen Information:

Sequence: Met 1-Asp 252

Background:

Twinfilin, also known as Protein A6, Protein tyrosine kinase 9, TWF1 and PTK9, is a cytoplasm protein which belongs to the actin-binding proteins ADF family and Twinfilin subfamily. Twinfilin (TWF1 / PTK9) is a highly conserved actin monomer-binding protein that regulates cytoskeletal dynamics in organisms from yeast to mammals. In addition to the mammalian twinfilin, a second protein with approximately 65% sequence identity to twinfilin exists in mouse and humans. TWF1 / PTK9 is expressed at high levels in the colon, testis, ovary, prostate and lung. It is expressed at lower levels in the brain, bladder and heart. It is not detected in liver. TWF1 / PTK9 is an actin-binding protein involved in motile and morphological processes. It inhibits actin polymerization, likely by sequestering G-actin. By capping the barbed ends of filaments, it also regulates motility. TWF1 / PTK9 seems to play an important role in clathrin-mediated endocytosis and distribution of endocytic organelles.