



Recombinant Protein Technical Manual
Recombinant Human DUSP14/MKP-6 Protein (His & MBP Tag)
RPES2740

Product Data:

Product SKU: RPES2740

Size: 20µg

Species: Human

Expression host: E. coli

Uniprot: O95147

Protein Information:

Molecular Mass: 65 kDa

AP Molecular Mass: 60 kDa

Tag: N-His & MBP

Bio-activity:

Purity: > 88 % 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 PBS, pH 7.5

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

Application:

Synonyms: MKP-L;MKP6

Immunogen Information:

Sequence: Met 1 –His 191

Background:

Dual specific phosphatase 14 / MAP-kinase phosphatase-6 (DUSP14 / MKP6) is a member of Dual-specificity phosphatases that is a subclass of protein tyrosine phosphatases (PTP) families that can dephosphorylate both phosphotyrosine and phosphoserine / phosphothreonine residues in substrates. Unlike many other DUSPs, DUSP14 only contains a catalytic domain within the C-terminal region. In signal transduction, DUSP14 has been considered as negative regulator of the mitogen-activated protein kinase (MAPK) / extracellular signal-regulated kinase 1 / 2 (ERK 1 / 2) pathway. DUSP14 phosphatase activity has been confirmed to be inhibited by PTP inhibitor **IV**. PTP inhibitor binds to the catalytic site of DUSP14. PTP inhibitor **IV** effectively and specifically inhibited DUSP14-mediated dephosphorylation of JNK, a member of the mitogen-activated protein kinase (MAPK) family through dephosphorylation of both the Ser / Thr and Tyr residues of MAPKs.