



Recombinant Protein Technical Manual
Recombinant Mouse OMGP/OMG Protein (aa 1-245,
His Tag)
RPES0273

Product Data:

Product SKU: RPES0273

Size: 20µg

Species: Mouse

Expression host: HEK293 Cells

Uniprot: Q63912

Protein Information:

Molecular Mass: 27 kDa

AP Molecular Mass: 44 kDa

Tag: C-His

Bio-activity:

Purity: > 95 % as determined by SDS-PAGE

Endotoxin: < 1.0 EU per µg of the protein 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 sterile PBS, pH 7.4

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

Application:

Synonyms: RP23-67E18.6, LNGFR, Tnfrsf16, p75, p75NGFR, p75NTR

Immunogen Information:

Sequence: Met 1-Thr 245

Background:

Oligodendrocyte-myelin glycoprotein, also known as OMG and OMGP, is a cell membrane protein which contains eight LRR (leucine-rich) repeats. OMG / OMGP is a glycosylphosphatidylinositol-anchored protein expressed by neurons and oligodendrocytes in the central nervous system (CNS). OMG / OMGP is a cell adhesion molecule contributing to the interactive process required for myelination in the central nervous system. OMG / OMGP play roles in both the developing and adult central nervous system. OMG / OMGP participates in growth cone collapse and inhibition of neurite outgrowth through its interaction with NgR, the receptor for Nogo. This function requires its leucine-rich repeat domain, a highly conserved region in OMgp during mammal evolution. OMG / OMGP leucine-rich repeat domain is also implicated in the inhibition of cell proliferation. OMG / OMGP may also be involved in the formation and maintenance of myelin sheaths. Cell proliferation, neuronal sprouting and myelination are crucial processes involved in brain development and regeneration after injury.