Recombinant SHSA9 protein (His tag)

Catalog Number	548645
Species	Human
Expression System	E. coli
Accession	B4DS77
Molecular Weight	Predictes a molecular mass of 10.96 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 11 kDa band.

Product Information

Sequence Region	69-149
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>88%, by SDS-PAGE with Coomassie Brilliant Blue staining.
Endotoxin	Not tested.
Activity	Not tested.
Stability	Samples are stable for up to twelve months from date of receipt at -70℃
Protein Construction	DNA encoding 69-149 aa (B4DS77) were fused with 6His tag.

Storage & Handling

Reconstitution	Reconstitute at 0.25 μg/μl in sterile water for short-term storage. Reconstitution with 50% glycerol solution is recommended for longer term storage (see Stability and Storage for more details). If a different concentration is needed for your purposes please adjust the reconstitution volume as required (please note: the ion concentration of the final solution will vary according to the volume used). Note: Centrifuge vial before opening. When reconstituting, gently pipet and wash down the sides of the vial to ensure full recovery of the protein into solution.
Storage	Store it under sterile conditions at -20℃ to -80℃. It is recommended that the protein be aliquoted for optimal storage. Avoid repeated freeze-thaw cycles.
Shipping	In general, recombinant proteins are provided as lyophilized powder which are shipped at ambient temperature. Bulk packages of recombinant proteins are provided as frozen liquid. They are shipped out with blue ice unless customers require otherwise.

Description

Description	Recombinant Human Protein shisa-9 Fragment (69-149) is a high-quality, stable protein fragment designed for structural and biochemical studies. This 81-amino acid fragment represents a soluble unit of Protein shisa-9, a key regulator of synaptic plasticity, enabling researchers to investigate its role in AMPA receptor modulation with precision. Protein shisa-9, encoded by the SHISA9 gene in Homo sapiens, functions as a regulator of short-term neuronal synaptic plasticity in the dentate gyrus. It associates with AMPA receptors (ionotropic glutamate receptors) in synaptic spines and promotes AMPA receptor desensitization at excitatory synapses, influencing neuronal communication. The protein is localized to the cell projection, specifically the dendritic spine membrane, and is classified as a single-pass type I membrane protein, with presence in synapses underscoring its critical role in neuronal function and signaling pathways.