Recombinant B3GN8 protein (His tag)

Catalog Number	545319
Synonyms	BGnT-8; Beta-1,3-Gn-T8; Beta-1,3-N-acetylglucosaminyltransferase 8; Beta3Gn-T8
Species	Human
Expression System	E. coli
Accession	Q7Z7M8
Molecular Weight	Predictes a molecular mass of 42.51 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 43 kDa band.

Product Information

Sequence Region	24-397
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>86%, 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 24-397 aa (Q7Z7M8) 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	This product is a recombinant fragment of UDP-GlcNAc:betaGal beta-1,3-N-acetylglucosaminyltransferase 8 (BGnT-8), a key human enzyme involved in the elongation of multiantennary N-glycans. The fragment (amino acids 24-397) has been optimized for stability and solubility, making it ideal for structural studies and biochemical assays. BGnT-8 is a beta-1,3-N-acetylglucosaminyltransferase that specifically elongates branch structures of multiantennary N-glycans, with strong activity toward tetraantennary and 2,6 triantennary glycans. This enzyme is localized to the Golgi apparatus membrane as a single-pass type II membrane protein, where it plays a crucial role in glycan biosynthesis, as supported by research findings from PubMed:15620693 and PubMed:15917431.