

Recombinant Protein Technical Manual Recombinant Human GBA3/CBGL1 Protein (His Tag)(Active) RPES0853

## Product Data:

Product SKU: RPES0853	Size: 10µg

Species: Human

Expression host: Baculovirus-Insect Cells

**Uniprot:** NP\_066024.1

Drotair	Inforn	nation

Molecular Mass:	55 kDa
AP Molecular Mass:	50 kDa
Tag:	C-His
Bio-activity:	Measured by its ability to hydrolyze 4-methylumbelliferyl-β-D glucopyranoside. The specific activity is >1,500 pmoles/min/μg.
Purity:	> 95 % as determined by reducing SDS-PAGE.
Endotoxin:	< 1.0 EU per $\mu g$ 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 20mM Tris, 500mM NaCl, 10% glycerol, pH 7.4
Reconstitution:	Please refer to the printed manual for detailed information.
Application:	
Synonyms:	CBG;CBGL1;GBA3;GLUC;KLrP;MGC104276;MGC126878

## Sequence: Met 1-Leu 469

## Background:

"Cytosolic beta-glucosidase, also known as Cytosolic beta-glucosidase-like protein 1, GBA3, CBG and CBGL1 is a cytoplasm protein which belongs to the glycosyl hydrolase 1 family and Klotho subfamily. GBA3 / CBGL1 is a glycosidase probably involved in the intestinal absorption and metabolism of dietary flavonoid glycosides. GBA3 / CBGL1 is present in small intestine (at protein level). GBA3 / CBGL1 is expressed in liver, small intestine, colon, spleen and kidney. GBA3 / CBGL1 is down-regulated in renal cell carcinomas and hepatocellular carcinomas. GBA3 / CBGL1 is able to hydrolyze a broad variety of glycosides including phytoestrogens, flavonols, flavones, flavanones and cyanogens. GBA3 / CBGL1 possesses beta-glycosylceramidase activity and may be involved in a nonlysosomal catabolic pathway of glycosylceramide.