Product Name: β-1,3-Gal-T1 Rabbit Polyclonal Antibody
Catalog #: APRab20338
For research use only.

Summary

Description	Rabbit polyclonal Antibody
Host	Rabbit
Application	WB,ELISA
Reactivity	Human,Mouse
Conjugation	Unconjugated
Modification	Unmodified
Isotype	IgG
Clonality	Polyclonal
Form	Liquid
Concentration	1mg/ml
Storage	Aliquot and store at -20°C (valid for 12 months). Avoid freeze/thaw cycles.
Shipping	Ice bags
Buffer	Liquid in PBS containing 50% glycerol, 0.5% protective protein and 0.02% New type preservative N.
Purification	Affinity purification

Application

Dilution Ratio	WB 1:500-1:2000,ELISA 1:10000-1:20000
Molecular Weight	36kDa

Antigen Information

Gene Name	B3GALT1
Alternative Names	B3GALT1; Beta-1; 3-galactosyltransferase 1; Beta-1,3-GalTase 1; Beta3Gal-T1; Beta3GalT1; UDP-galactose:beta-N-acetyl-glucosamine-beta-1,3-galactosyltransferase 1
Gene ID	8708.0
SwissProt ID	Q9Y5Z6
Immunogen	The antiserum was produced against synthesized peptide derived from human B3GALT1. AA range:61-110

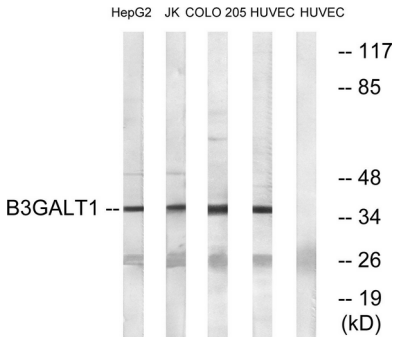
Background

This gene is a member of the beta-1,3-galactosyltransferase (beta3GalT) gene family. This family encodes type II membrane-bound glycoproteins with diverse enzymatic functions using different donor substrates (UDP-galactose and UDP-N-acetylglucosamine) and different acceptor sugars (N-acetylglucosamine, galactose, N-acetylgalactosamine). The beta3GalT genes are distantly related to the Drosophila Brainiac gene and have the protein coding sequence contained in a single exon. The beta3GalT proteins also contain conserved sequences not found in the beta4GalT or alpha3GalT proteins. The carbohydrate chains synthesized by these enzymes are designated as type 1, whereas beta4GalT enzymes synthesize type 2 carbohydrate chains. The ratio of type 1:type 2 chains changes during embryogenesis. By sequence similarity, the beta3GalT genes fall into at least two groups: beta3GalT4 and 4 other beta3cofactor:Manganese.,function:Beta-1,3-galactosyltransferase that transfers galactose from UDP-galactose to substrates with a terminal beta-N-acetylglucosamine (beta-GlcNAc) residue. Involved in the biosynthesis of the carbohydrate moieties of glycolipids and glycoproteins. Inactive towards substrates with terminal alpha-N-acetylglucosamine (alpha-GlcNAc) or alpha-N-acetylgalactosamine (alpha-GalNAc) residues.,online information:Beta-1,3-galactosyltransferase 1,online information:GlycoGene database,pathway:Protein modification; protein glycosylation.,similarity:Belongs to the glycosyltransferase 31 family.,tissue specificity:Detected in brain and colon mucosa and to a lesser extent in colon adenocarcinoma cells.,

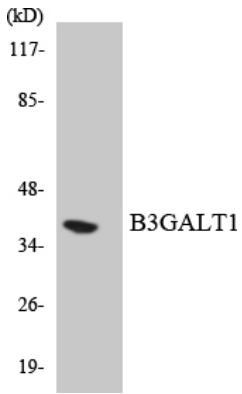
Research Area

Glycosphingolipid biosynthesis;

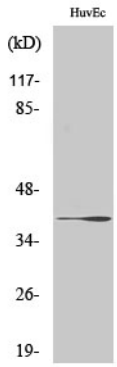
Image Data



Western blot analysis of lysates from HUVEC, COLO, Jurkat, and HepG2 cells, using B3GALT1 Antibody. The lane on the right is blocked with the synthesized peptide.



Western blot analysis of the lysates from HUVECcells using B3GALT1 antibody.



Western Blot analysis of various cells using β-1,3-Gal-T1 Polyclonal Antibody. Secondary antibody was diluted at 1:20000