



Anti-human PLTP Antibody

ORDERING INFORMATION

Catalog Number: AF5109

Lot Number: CBOY01

Size: 100 µg

Formulation: 0.2 µm filtered solution in PBS with 5% trehalose

Storage: -20° C

Reconstitution: sterile PBS

Specificity: human PLTP

Immunogen: NS0-derived rhPLTP isoform 1

Ig Type: sheep IgG

Applications: Western blot
Direct ELISA

Background

PLTP (phospholipid transfer protein) is a 65 - 81 kDa, secreted glycoprotein member of the BPI/LBP family of proteins. It is expressed by multiple cell types, circulates bound to HDL, and mediates the transfer of phospholipids and cholesterol from apoB-containing lipoproteins to HDL. Mature human PLTP is 476 amino acids (aa) in length. It contains an N-terminal lipid transfer domain and a C-terminal HDL-binding domain. There is one essential intrachain disulfide bond (Cys146 - Cys185). There are four potential PLTP splice variants. Two show alternate start sites at Met21 and Met89. Two others demonstrate aa substitutions; one shows a one aa (Lys) substitution for aa 110 - 162, and a second shows a four aa substitution for the N-terminal 35 amino acids. Over aa 18 - 493, human PLTP shares 92% and 83% aa identity with porcine and mouse PLTP, respectively.

Preparation

Produced in sheep immunized with purified, NS0-derived, recombinant human PLTP isoform 1 (rhPLTP; aa 18 - 493; Accession # P55058, with a Glu18Val substitution). Human PLTP specific IgG was purified by human PLTP affinity chromatography.

Formulation

Lyophilized from a 0.2 µm filtered solution in phosphate-buffered saline (PBS) with 5% trehalose.

Reconstitution

Reconstitute with sterile PBS. If 0.5 mL of PBS is used, the antibody concentration will be 0.2 mg/mL.

Storage

Lyophilized samples are stable for twelve months from date of receipt when stored at -20° C to -70° C. Upon reconstitution, the antibody can be stored at 2° - 8° C for 1 month without detectable loss of activity. Reconstituted antibody can also be aliquotted and stored frozen at -20° C to -70° C in a **manual defrost freezer** for six months without detectable loss of activity. **Avoid repeated freeze-thaw cycles.**

Specificity

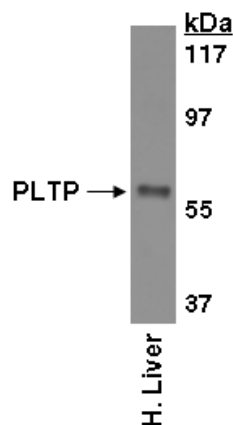
This antibody has been selected for its ability to recognize human PLTP in direct ELISAs and Western blots. In direct ELISAs, this antibody shows approximately 10% cross-reactivity with rmPLTP.

Applications

Western blot - An antibody concentration of 1.0 µg/mL is recommended.

Direct ELISA - This antibody can be used at 0.5 - 1.0 µg/mL with the appropriate secondary reagents to detect human PLTP. The detection limit for rhPLTP is approximately 0.3 ng/well.

Optimal dilutions should be determined by each laboratory for each application.



Detection of PLTP with AF5109.

Tissue lysates were resolved by SDS-PAGE, transferred to an Immobilon-P membrane and immunoblotted with 1.0 µg/mL sheep anti-hPLTP.