Alkaline Phosphatase Monoclonal Mouse Antibody (ALPP/516)

Product Description

This antibody reacts with placental alkaline phosphatase. There are at least four distinct but related alkaline phosphatases: intestinal, placental (PLAP), placental-like, and liver/bone/kidney (tissue non-specific). The first three are located together on chromosome 2, while the tissue non-specific form is located on chromosome 1. PLAP is a tissue specific, trophoblast-derived, 70 kDa, glycosyl-phosphatidylinositol (GPI)-anchored, dimeric, zinc metallo-glycoprotein that catalyzes the hydrolysis of phosphomonoesters into an inorganic phosphate and an alcohol. It is present in the placenta and serum of pregnant women and in high frequency in gynecological and testicular cancers and in lower frequency in other tumors. The three tissue-specific AP's in humans, PLAP, germ cell AP (GCAP) and intestinal AP, are 90-98% homologous. Non-tissue specific AP is found in kidney, liver and bone. This MAb binds equally well to all common allelic variants (S, F, FS and I) of PLAP and to some variants of AP from normal human testis. This MAb can be used as tracer antibody in ELISA to detect PLAP in serum of S, F, FS and I phenotypes. Primary antibodies are available purified, or with a selection of fluorescent CF® dyes and other labels. CF® dyes offer exceptional brightness and photostability. See the CF® Dye Brochure for more information. Note: Conjugates of blue fluorescent dyes like CF®405S and CF®405M are not recommended for detecting low abundance targets, because blue dyes have lower fluorescence and can give higher non-specific background than other dye colors. **Stock status:** Because Biotium offers a large number of antibody and conjugation options, primary antibody conjugates may be made to order. Typical lead times are up to one week for CF® dye and biotin conjugates, and up to 2-3 weeks for fluorescent protein and enzyme conjugates. Please email order@biotium.com to inquire about stock status and lead times before placing your order. **Catalog number key for antibody number 0516, Anti-Alkaline Phosphatase (ALPL/516)** /]

Product attributes

Antibody number	#0516
research-areas	Developmental biology, Metabolism
Antibody reactivity	Alkaline Phosphatase
Antibody type	Primary
Host species	Mouse
Clonality	Monoclonal
Clone	ALPP/516
Isotype	IgG1, kappa
Molecular weight	70 kDa
Synonyms	Alkaline phosphatase placental type; Alkaline phosphatase Regan Isozyme; ALP; Alp1; ALPP; Germ-cell alkaline phosphatase; nagao Isozyme; PALP; Placental alkaline phosphatase 1; placental heat-stable alkaline phosphatase; PLAP-1; PLAP1
Human gene symbol	ALPP
Entrez gene ID	250
SwissProt	P05187
Unigene	284255
Immunogen	Recombinant full-length human ALPP protein
Antibody target cellular localization	Plasma membrane
Species reactivity	Human
Antibody application notes	For coating for ELISA, order Ab without BSA, Higher concentration may be required for direct detection using primary antibody conjugates than for indirect detection with secondary antibody, Optimal dilution and staining procedure for a specific application should be determined by user, Recommended starting concentrations for titration are 1-2 ug/mL for most applications, or 1 ug/million cells/100 uL for flow cytometry
Positive control	HepG2 cells. Placenta or seminoma
Shipping condition	Room temperature
Storage Conditions	Store at 2 to 8 °C, Protect fluorescent conjugates from light, Note: store BSA-free antibodies at -10 to -35 °C
Regulatory status	For research use only (RUO)
Antibody/conjugate formulation	Conjugates: 0.1 mg/mL in PBS/0.1% BSA/0.05% azide, HRP conjugates: 0.1 mg/mL in PBS/0.05% BSA, Purified: 0.2 mg/mL in PBS/0.05% BSA/0.05% azide, Purified, BSA-free: 1 mg/mL in PBS without azide
Shelf life	Guaranteed for at least 24 months from date of receipt when stored as recommended
Antibody research areas	Developmental biology, Metabolism