

## PLAP Monoclonal Antibody

<b>Catalog No :</b>	YM0522
<b>Reactivity :</b>	Human
<b>Applications :</b>	WB;IHC;IF;ELISA
<b>Target :</b>	PLAP
<b>Fields :</b>	>>Thiamine metabolism;>>Folate biosynthesis;>>Metabolic pathways;>>Biosynthesis of cofactors
<b>Gene Name :</b>	ALPP
<b>Protein Name :</b>	Alkaline phosphatase, placental type
<b>Human Gene Id :</b>	250
<b>Human Swiss Prot No :</b>	P05187
<b>Immunogen :</b>	Purified recombinant fragment of human PLAP expressed in E. Coli.
<b>Specificity :</b>	PLAP Monoclonal Antibody detects endogenous levels of PLAP protein.
<b>Formulation :</b>	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
<b>Source :</b>	Monoclonal, Mouse
<b>Dilution :</b>	WB 1:500 - 1:2000. IHC 1:200 - 1:1000. ELISA: 1:10000.. IF 1:50-200
<b>Purification :</b>	Affinity purification
<b>Storage Stability :</b>	-15°C to -25°C/1 year(Do not lower than -25°C)
<b>Molecularweight :</b>	58kD
<b>Cell Pathway :</b>	Folate biosynthesis;

**P References :** 1. J Cell Biochem. 2003 Apr 1;88(5):1025-37.  
2. J Mol Biol. 2005 Jul 15;350(3):441-51.

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**Background :** The protein encoded by this gene is an alkaline phosphatase, a metalloenzyme that catalyzes the hydrolysis of phosphoric acid monoesters. It belongs to a multigene family composed of four alkaline phosphatase isoenzymes. The enzyme functions as a homodimer and has a catalytic site containing one magnesium and two zinc ions, which are required for its enzymatic function. The protein is primarily expressed in placental and endometrial tissue; however, strong ectopic expression has been detected in ovarian adenocarcinoma, serous cystadenocarcinoma, and other ovarian cancer cells. [provided by RefSeq, Jan 2015],

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**Function :** catalytic activity:A phosphate monoester + H(2)O = an alcohol + phosphate.,cofactor: Binds 1 magnesium ion.,cofactor: Binds 2 zinc ions.,miscellaneous: In most mammals there are four different isozymes: placental, placental-like, intestinal and tissue non-specific (liver/bone/kidney).,online information: Alkaline phosphatase entry,polymorphism: Placental ALP is highly polymorphic, there are at least three common alleles.,similarity: Belongs to the alkaline phosphatase family.,subunit: Homodimer.,

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**Subcellular Location :** Cell membrane; Lipid-anchor, GPI-anchor .

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**Expression :** Detected in placenta (at protein level).

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**Sort :** 12815

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**No4 :** 1

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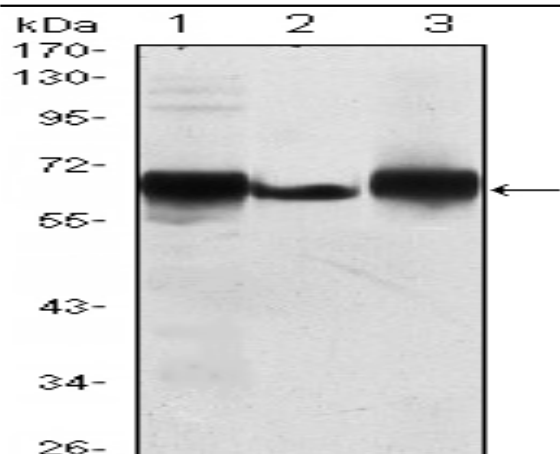
**Host :** Mouse

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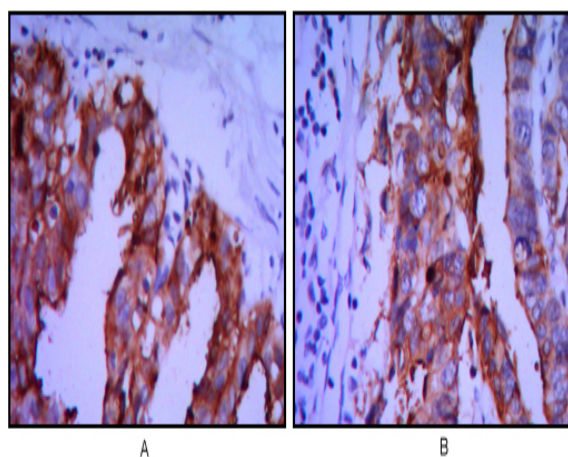
**Modifications :** Unmodified

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**Products Images**



Western Blot analysis using PLAP Monoclonal Antibody against HepG2 (1), A431 (2) and MCF-7 (3) cell lysate.



Immunohistochemistry analysis of paraffin-embedded ovarian cancer (A), stomach cancer (B) with DAB staining using PLAP Monoclonal Antibody.