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Hemoglobin subunit gamma 2 Rabbit pAb

Catalog # AP99836

Product Information

Application	IHC-P, IHC-F, IF
Primary Accession	P69892
Other Accession	P69892
Predicted	Human
Host	Rabbit
Clonality	Polyclonal
Calculated MW	16126
Physical State	Liquid
Immunogen	KLH conjugated synthetic peptide derived from human Hemoglobin subunit gamma 2
Epitope Specificity	121-147/147
Isotype	IgG
Purity	affinity purified by Protein A
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SIMILARITY	Belongs to the globin family.
Post-translational modifications	Acetylation of Gly-2 converts Hb F to the minor Hb F1.
DISEASE	Defects in HBG2 are the cause of cyanosis transient neonatal (TNCY) [MIM:613977]. TNCY is a disorder characterized by cyanosis in the fetus and neonate, due to a defect in the fetal hemoglobin chain which has reduced affinity for oxygen. Some patients develop anemia resulting from increased destruction of red cells containing abnormal or unstable hemoglobin. The cyanosis resolves spontaneously by 5 to 6 months of age or earlier, as the adult beta-globin chain is produced and replaces the fetal gamma-globin chain.
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	The gamma globin genes (HBG1 and HBG2) are normally expressed in the fetal liver, spleen and bone marrow. Two gamma chains together with two alpha chains constitute fetal hemoglobin (HbF) which is normally replaced by adult hemoglobin (HbA) at birth. In some beta-thalassemias and related conditions, gamma chain production continues into adulthood. The two types of gamma chains differ at residue 136 where glycine is found in the G-gamma product (HBG2) and alanine is found in the A-gamma product (HBG1). The former is predominant at birth. The order of the genes in the beta-globin cluster is: 5'- epsilon -- gamma-G -- gamma-A -- delta -- beta--3'. [provided by RefSeq, Jul 2008]

Additional Information

Gene ID	3048
Other Names	HBG-T1; TNCY; HBG2_HUMAN; HBG2; Gamma-2-globin; Hb F Ggamma;

	Hemoglobin gamma-2 chain; Hemoglobin gamma-G chain; hemoglobin subunit gamma 2; hemoglobin, gamma G; fetal hemoglobin F subunit gamma 2
Dilution	IHC-P=1:100-500,IHC-F=1:100-500,ICC/IF=1:100-500,IF=1:100-500
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Protein Information

Name	HBG2
Function	Gamma chains make up the fetal hemoglobin F, in combination with alpha chains.
Tissue Location	Red blood cells.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.