



Anti-CYP3A4 polyclonal antibody (DPAB-DC690)

This product is for research use only and is not intended for diagnostic use.

PRODUCT INFORMATION

Antigen Description	This gene encodes a member of the cytochrome P450 superfamily of enzymes. The cytochrome P450 proteins are monooxygenases that catalyze many reactions involved in drug metabolism and synthesis of cholesterol, steroids and other lipids. This protein localizes to the endoplasmic reticulum and its expression is induced by glucocorticoids and some pharmacological agents. This enzyme is involved in the metabolism of approximately half the drugs in use today, including acetaminophen, codeine, cyclosporin A, diazepam and erythromycin. The enzyme also metabolizes some steroids and carcinogens. This gene is part of a cluster of cytochrome P450 genes on chromosome 7q21.1. Previously another CYP3A gene, CYP3A3, was thought to exist; however, it is now thought that this sequence represents a transcript variant of CYP3A4. Alternatively spliced transcript variants encoding different isoforms have been identified.
Specificity	This antibody is not expected to cross-react with 3A5, 3A7 or 3A43.
Immunogen	A synthetic peptide corresponding to human CYP3A4. The sequence is C-KESRLEDTQKHR
Source/Host	Goat
Species Reactivity	Human
Purification	Antigen affinity purification
Conjugate	Unconjugated
Applications	ELISA,
Format	Liquid
Concentration	0.5 mg/mL

Size	100 µg
Buffer	In Tris saline, pH 7.3 (0.5% BSA, 0.02% sodium azide)
Preservative	0.02% Sodium Azide
Storage	Store at -20°C. Aliquot to avoid repeated freezing and thawing.

GENE INFORMATION

Gene Name	CYP3A4 cytochrome P450, family 3, subfamily A, polypeptide 4 [Homo sapiens (human)]
Official Symbol	CYP3A4
Synonyms	CYP3A4; cytochrome P450, family 3, subfamily A, polypeptide 4; HLP; CP33; CP34; CYP3A; NF-25; CYP3A3; P450C3; CYP1IIA3; CYP1IIA4; P450PCN1; cytochrome P450 3A4; nifedipine oxidase; cytochrome P450 3A3; cytochrome P450 HLP; cytochrome P450-PCN1; cytochrome P450 NF-25; albendazole sulfoxidase; quinine 3-monoxygenase; albendazole monooxygenase; P450-III, steroid inducible; glucocorticoid-inducible P450; 1,8-cineole 2-exo-monooxygenase; taurochenodeoxycholate 6-alpha-hydroxylase; cytochrome P450, subfamily IIIA (nifedipine oxidase), polypeptide 3; cytochrome P450, subfamily IIIA (nifedipine oxidase), polypeptide 4;
Entrez Gene ID	1576
Protein Refseq	NP_001189784
UniProt ID	P08684
Chromosome Location	7q21.1
Pathway	Aflatoxin B1 metabolism; Bile secretion; Biological oxidations; Chemical carcinogenesis
Function	albendazole monooxygenase activity; caffeine oxidase activity; enzyme binding; heme binding