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Anti-GST3/GST Pi Picoband Antibody

Catalog # ABO11876

Product Information

Application	WB, IHC-P
Primary Accession	P09211
Host	Rabbit
Reactivity	Human, Rat
Clonality	Polyclonal
Format	Lyophilized
Description	Rabbit IgG polyclonal antibody for Glutathione S-transferase P(GSTP1) detection. Tested with WB, IHC-P in Human;Rat.
Reconstitution	Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Additional Information

Gene ID	2950
Other Names	Glutathione S-transferase P, 2.5.1.18, GST class-pi, GSTP1-1, GSTP1, FAEES3, GST3
Calculated MW	23356
Application Details	Immunohistochemistry(Paraffin-embedded Section), 0.5-1 □g/ml, Human, Rat, By Heat Western blot, 0.1-0.5 □g/ml, Human, Rat
Subcellular Localization	Cytoplasm . Mitochondrion . Nucleus . The 83 N-terminal amino acids function as un uncleaved transit peptide, and arginine residues within it are crucial for mitochondrial localization.
Source	Eukaryota
Protein Name	Glutathione S-transferase P
Contents	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.
Immunogen	E.coli-derived human GST3 recombinant protein (Position: P2-Q210). Human GST3 shares 85% and 86% amino acid (aa) sequences identity with mouse and rat GST3, respectively.
Purification	Immunogen affinity purified.
Cross Reactivity	No cross reactivity with other proteins
Storage	At -20˚C for one year. After r˚Constitution, at 4˚C for one month. It˚Can also

	be aliquotted and stored frozen at -20˚C for a longer time.Avoid repeated freezing and thawing.
Sequence Similarities	Belongs to the GST superfamily. Pi family.

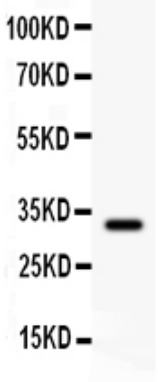
Protein Information

Name	GSTP1 (HGNC:4638)
Synonyms	FAEES3, GST3
Function	Catalyzes conjugation of reduced glutathione to a wide number of exogenous and endogenous hydrophobic electrophiles (PubMed:1540159, PubMed:1567427, PubMed:8433974). Involved in the formation of glutathione conjugates of both prostaglandin A2 (PGA2) and prostaglandin J2 (PGJ2) (PubMed:9084911). Participates in the formation of novel hepoxilin regioisomers (PubMed:21046276). Acts as a negative regulator of ferroptosis by mediating glutathione conjugation and detoxification of 4-hydroxynonenal (4-HNE) reactive aldehyde (PubMed:38016474). Negatively regulates CDK5 activity via p25/p35 translocation to prevent neurodegeneration (PubMed:21668448).
Cellular Location	Cytoplasm. Mitochondrion. Nucleus. Note=The 83 N-terminal amino acids function as un uncleaved transit peptide, and arginine residues within it are crucial for mitochondrial localization

Background

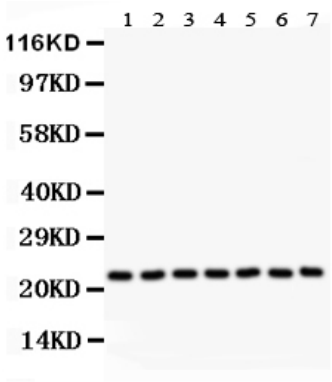
Glutathione S-transferases pi (GSTP1), also known as GST3, is an enzyme that in humans is encoded by the GSTP1 gene. This gene is mapped to 11q13.2. GSTP1 has 7 exons and 6 introns contained within approximately 2.8 kilobases. GSTP1 belongs to Glutathione S-transferases (GSTs) which are a family of enzymes that play an important role in detoxification by catalyzing the conjugation of many hydrophobic and electrophilic compounds with reduced glutathione. GSTP1 presents in all tissues and cells, with the exception of red cells, in which only erythrocyte GST(GSTe) is observed. What's more, GSTP1 is a polymorphic gene encoding active, functionally different GSTP1 variant proteins that are thought to function in xenobiotic metabolism and play a role in susceptibility to cancer, and other diseases.

Images

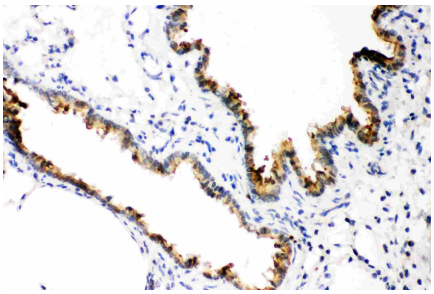


Anti- GST3/GST pi Picoband antibody, ABO11876, Western blottingAll lanes: Anti GST3/GST pi(ABO11876) at 0.5ug/mlWB: Recombinant Human GST3 Protein 0.5ngPredicted bind size: 32KDObserved bind size: 32KD

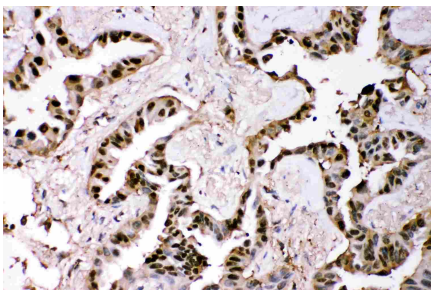
Anti- GST3/GST pi Picoband antibody, ABO11876, Western blottingAll lanes: Anti GST3/GST pi (ABO11876) at 0.5ug/mlLane 1: Rat Brain Tissue Lysate at 50ugLane 2: Rat Kidney Tissue Lysate at 50ugLane 3: Rat Liver Tissue



Lysate at 50ugLane 4: Hela Whole Cell Lysate at 40ugLane 5: HT1080 Whole Cell Lysate at 40ugLane 6: MCF-7 Whole Cell Lysate at 40ugLane 7: SW620 Whole Cell Lysate at 40ugPredicted bind size: 23KD Observed bind size: 23KD



Anti- GST3/GST pi Picoband antibody, ABO11876, IHC(P)IHC(P): Rat Lung Tissue



Anti- GST3/GST pi Picoband antibody, ABO11876, IHC(P)IHC(P): Human Lung Cancer Tissue

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