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AKR1D1 Polyclonal Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP58262

Specification

AKR1D1 Polyclonal Antibody - Product Information

Application	**IHC-P, IHC-F, IF, E**
Primary Accession	P51857
Reactivity	**Rat, Dog, Bovine**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**37 KDa**
Physical State	**Liquid**
Immunogen	**KLH conjugated synthetic peptide derived from human AKR1D1**
Epitope Specificity	**101-200/326**
Isotype	**IgG**
Purity	
affinity purified by Protein A	
Buffer	**0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.**
SUBCELLULAR LOCATION	**Cytoplasm.**
SIMILARITY	**Belongs to the aldo/keto reductase family.**
DISEASE	**Congenital bile acid synthesis defect 2 (CBAS2) [MIM:235555]: A condition characterized by jaundice, intrahepatic cholestasis and hepatic failure. Patients with this liver disease show absence or low levels of chenodeoxycholic acid and cholic acid in plasma and urine. Note=The disease is caused by mutations affecting the gene represented in this entry.**
Important Note	**This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.**

Background Descriptions
Efficiently catalyzes the reduction of progesterone, androstenedione, 17-alpha-hydroxyprogesterone and testosterone to 5-beta-reduced metabolites. The bile acid intermediates 7-alpha,12-alpha-dihydroxy-4-cholesten-3-one and 7-alpha-hydroxy-4-cholesten-3-one can also act as substrates.

AKR1D1 Polyclonal Antibody - Additional Information

Gene ID 6718

Other Names
Aldo-keto reductase family 1 member D1, 1.3.1.3, 3-oxo-5-beta-steroid 4-dehydrogenase,

Delta(4)-3-ketosteroid 5-beta-reductase, Delta(4)-3-oxosteroid 5-beta-reductase, AKR1D1, SRD5B1

Target/Specificity
Highly expressed in liver. Expressed in testis and weakly in colon.

Dilution
IHC-P~~N/A<br \>IHC-F~~N/A<br \>IF~~1:50~200<br \>E~~N/A

Storage
Store at -20 ℃ 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 ℃.

AKR1D1 Polyclonal Antibody - Protein Information

Name AKR1D1

Synonyms SRD5B1

Function
Catalyzes the stereospecific NADPH-dependent reduction of the C4-C5 double bond of bile acid intermediates and steroid hormones carrying a delta(4)-3-one structure to yield an A/B cis-ring junction. This cis-configuration is crucial for bile acid biosynthesis and plays important roles in steroid metabolism. Capable of reducing a broad range of delta-(4)-3-ketosteroids from C18 (such as, 17beta- hydroxyestr-4-en-3-one) to C27 (such as, 7alpha-hydroxycholest-4-en-3- one).

Cellular Location
Cytoplasm.

Tissue Location
Highly expressed in liver. Expressed in testis and weakly in colon.

AKR1D1 Polyclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

AKR1D1 Polyclonal Antibody - Images

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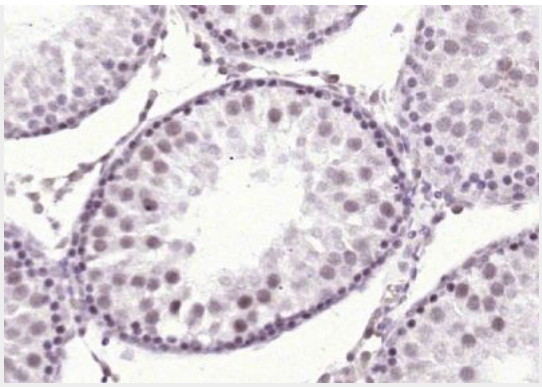
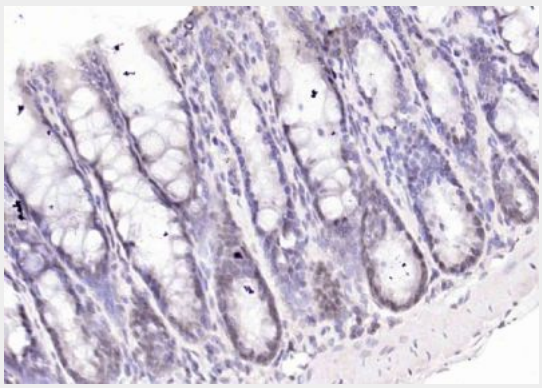


Paraformaldehyde-fixed, paraffin embedded (rat testis); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (AKR1D1) Polyclonal Antibody, Unconjugated (bs-5026R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructionsand DAB staining.



Paraformaldehyde-fixed, paraffin embedded (rat colon); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (AKR1D1) Polyclonal Antibody, Unconjugated (bs-5026R) at 1:200 overnight at 4°C, followed by operating according to SP Kit(Rabbit) (sp-0023) instructionsand DAB staining.