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SRD5A2 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP5552c

Product Information

Application	WB, E
Primary Accession	P31213
Other Accession	NP_000339.2
Reactivity	Human, Mouse
Predicted	Rat, Bovine, Canine, Rabbit, Chicken
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Clone Names	RB26426
Calculated MW	28407
Antigen Region	153-182

Additional Information

Gene ID	6716
Other Names	3-oxo-5-alpha-steroid 4-dehydrogenase 2, 5 alpha-SR2, SR type 2, Steroid 5-alpha-reductase 2, S5AR 2, Type II 5-alpha reductase, SRD5A2
Target/Specificity	This SRD5A2 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 153-182 amino acids from the Central region of human SRD5A2.
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.
Storage	Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	SRD5A2 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	SRD5A2
Function	Catalyzes the irreversible stereospecific reduction of the delta 4,5 bond (double bond between carbons 4 and 5) of various 3-oxo steroids (3-keto

	steroids) producing their 5alpha dihydro-3-oxo forms (PubMed:10898110, PubMed:23685396). Converts testosterone into 5-alpha- dihydrotestosterone (DHT), the most active androgen in the prostate, as it is the preferred ligand for androgen receptor (AR) transactivation, making this reaction a key step in male sexual differentiation during development (PubMed:10898110, PubMed:23685396). Besides testosterone, it can also act on other steroids, including progesterone, producing metabolites with diverse roles (PubMed:10898110). Hence, it plays a central role in sexual differentiation and androgen physiology (PubMed:10898110).
Cellular Location	Microsome membrane; Multi-pass membrane protein. Endoplasmic reticulum membrane; Multi-pass membrane protein
Tissue Location	Expressed in high levels in the prostate and many other androgen-sensitive tissues

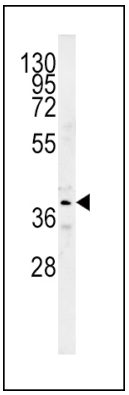
Background

This gene encodes a microsomal protein expressed at high levels in androgen-sensitive tissues such as the prostate. The encoded protein is active at acidic pH and is sensitive to the 4-azasteroid inhibitor finasteride. Deficiencies in this gene can result in male pseudohermaphroditism, specifically pseudovaginal perineoscrotal hypospadias (PPSH).

References

Thigpen, A.E., et al. N. Engl. J. Med. 327(17):1216-1219(1992)
Thigpen, A.E., et al. J. Clin. Invest. 90(3):799-809(1992)
Labrie, F., et al. Endocrinology 131(3):1571-1573(1992)
Andersson, S., et al. Nature 354(6349):159-161(1991)

Images



SRD5A2 Antibody (Center) (Cat. #AP5552c) western blot analysis in mouse kidney tissue lysates (15ug/lane).This demonstrates the SRD5A2 antibody detected SRD5A2 protein (arrow).

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