

TXNRD1 Antibody (Center)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP22147c

Specification

TXNRD1 Antibody (Center) - Product Information

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Isotype Calculated MW WB,E <u>O16881</u> <u>O62768</u>, <u>O9MYY8</u>, <u>O5NVA2</u> Human Bovine, Pig Rabbit polyclonal Rabbit IgG 70906

TXNRD1 Antibody (Center) - Additional Information

Gene ID 7296

Other Names

Thioredoxin reductase 1, cytoplasmic, TR, 1.8.1.9, Gene associated with retinoic and interferon-induced mortality 12 protein, GRIM-12, Gene associated with retinoic and IFN-induced mortality 12 protein, KM-102-derived reductase-like factor, Thioredoxin reductase TR1, TXNRD1, GRIM12, KDRF

Target/Specificity

This TXNRD1 antibody is generated from a rabbit immunized with a KLH conjugated synthetic peptide between 271-305 amino acids from the Central region of human TXNRD1.

Dilution WB~~1:2000

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

TXNRD1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

TXNRD1 Antibody (Center) - Protein Information

Name TXNRD1 (<u>HGNC:12437</u>)



Synonyms GRIM12, KDRF

Function Reduces disulfideprotein thioredoxin (Trx) to its dithiol- containing form (PubMed:<u>8577704</u>). Homodimeric flavoprotein involved in the regulation of cellular redox reactions, growth and differentiation. Contains a selenocysteine residue at the C-terminal active site that is essential for catalysis (Probable). Also has reductase activity on hydrogen peroxide (H2O2) (PubMed:<u>10849437</u>).

Cellular Location

[Isoform 1]: Cytoplasm [Isoform 5]: Cytoplasm

Tissue Location

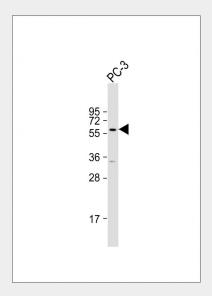
[Isoform 1]: Expressed predominantly in Leydig cells (at protein level). Also expressed in ovary, spleen, heart, liver, kidney and pancreas and in a number of cancer cell lines

TXNRD1 Antibody (Center) - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

TXNRD1 Antibody (Center) - Images



Anti-TXNRD1 Antibody (Center) at 1:2000 dilution + PC-3 whole cell lysate Lysates/proteins at 20 μ g per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 71 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

TXNRD1 Antibody (Center) - Background

Isoform 1 may possess glutaredoxin activity as well as thioredoxin reductase activity and induces



actin and tubulin polymerization, leading to formation of cell membrane protrusions. Isoform 4 enhances the transcriptional activity of estrogen receptors alpha and beta while isoform 5 enhances the transcriptional activity of the beta receptor only. Isoform 5 also mediates cell death induced by a combination of interferon-beta and retinoic acid.

TXNRD1 Antibody (Center) - References

Gasdaska P.Y., et al.FEBS Lett. 373:5-9(1995). Koishi R., et al.J. Biol. Chem. 272:2570-2577(1997). Hofman E.R., et al.Mol. Cell. Biol. 18:6493-6504(1998). Rundloef A.-K., et al.Free Radic. Biol. Med. 36:641-656(2004). Schuetze N., et al.Submitted (AUG-1997) to the EMBL/GenBank/DDBJ databases.