Thioredoxin Antibody / TXN / TRX (F40029)

Catalog No.	Formulation	Size
F40029-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F40029-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit Ig
Purity	Purified
UniProt	P10599
Applications	Western Blot : 1:1000
Limitations	This Thioredoxin antibody is available for research use only.

Western blot analysis of Thioredoxin in HL-60 lysate

Description

Thioredoxins (Trx) are small, multi-functional proteins with oxidoreductase activity and are ubiquitous in essentially all living cells. Trx contains a redox active disulfide/dithiol group within the conserved Cys-Gly-Pro-Cys active site. The two cysteine residues in the conserved active centers can be oxidized to form intramolecular disulfide bonds. Reduction of the active site disulfide in oxidized Trx is catalyzed by Trx reductase with NADPH as the electron donor. The reduced Trx is a hydrogen donor for ribonucleotide reductase, the essential enzyme for DNA synthesis, and a potent general protein disulfide reductase with numerous functions in growth and redox regulations. Specific protein disulfide targets for reduction by Trx include protein disulfide isomerase(PDI) and a number of transcription factors such as p53, NF-kB and

AP-1.Trx is also capable of removing H2O2, particularly when it is coupled with either methionine sulfoxide reductase or several isoforms of peroxiredoxins.

Application Notes

Titration of the Thioredoxin antibody may be required due to differences in protocols and secondary/substrate sensitivity.

Immunogen

A portion of amino acids 1-30 from the human protein was used as the immunogen for this Thioredoxin antibody.

Storage

Aliquot the Thioredoxin antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.