



# Recombinant E. coli Thioredoxin Reductase 1 (a.a. 1-321) (DAG2431)

This product is for research use only and is not intended for diagnostic use.

## PRODUCT INFORMATION

<b>Product Overview</b>	Recombinant human TXNRD1 protein, fused to His-tag at N-terminus, was expressed in E.coli and purified by using conventional chromatography techniques. This is a TRXB protein (a.a. 1-321).
<b>Antigen Description</b>	Thioredoxin Reductases (TR, TrxR) (EC 1.8.1.9) are the only known enzymes to reduce thioredoxin (Trx). Two classes of thioredoxin reductase have been identified: one class in bacteria and some eukaryotes and one in animals. Both classes are flavoproteins which function as homodimers. Each monomer contains a FAD prosthetic group, a NADPH binding domain, and an active site containing a redox-active disulfide bond.
<b>Species</b>	E. coli
<b>Purity</b>	Protein
<b>Conjugate</b>	Unconjugated
<b>Applications</b>	ELISA; PAGE
<b>Concentration</b>	1.0 mg/ml
<b>Size</b>	100 µg
<b>Buffer</b>	20 mM Tris-HCl buffer (pH8.0) containing 1mM DTT, 10% glycerol
<b>Preservative</b>	None
<b>Storage</b>	2-8°C short term, -20°C long term

## BACKGROUND

**Introduction**

Escherichia coli is a Gram-negative, rod-shaped bacterium that is commonly found in the lower intestine of warm-blooded organisms (endotherms). Most E. coli strains are harmless, but some serotypes can cause serious food poisoning in humans, and are occasionally responsible for product recalls due to food contamination. The harmless strains are part of the normal flora of the gut, and can benefit their hosts by producing vitamin K2, and by preventing the establishment of pathogenic bacteria within the intestine

**Keywords**

Escherichia coli; E. coli; Escherichia; Enterobacteriaceae; Enterobacteriales; Gammaproteobacteria; EC 1.8.1 protein; EC 1.8.1.9 protein; Gene associated with retinoic and IFN-induced mort; Gene associated with retinoic and interferon-induc; GRIM-12TR1 pr