



Recombinant Protein Technical Manual

Recombinant Human GSS Protein (His Tag)

RPES5105

Product Data:

Product SKU: RPES5105

Size: 10µg

Species: Human

Expression host: E. coli

Uniprot: P48637

Protein Information:

Molecular Mass: 53.5 kDa

AP Molecular Mass: 55 kDa

Tag: C-6His

Bio-activity:

Purity: > 95 % as determined by reducing SDS-PAGE.

Endotoxin: < 1.0 EU per µg as determined by the LAL method.

Storage: Store at < -20°C, stable for 6 months. Please minimize freeze-thaw cycles.

Shipping: This product is provided as liquid. It is shipped at frozen temperature with blue ice/gel packs. Upon receipt, store it immediately at < -20°C.

Formulation: Supplied as a 0.2 µm filtered solution of 20mM TrisHCl, 200mM NaCl, pH 7.5 .

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: Glutathione Synthetase; GSH Synthetase; GSH-S; Glutathione Synthase; GSS

Immunogen Information:

Sequence: Ala2-Val474

Background:

Glutathione Synthetase belongs to the eukaryotic GSH synthase family. Glutathione Synthetase is the second enzyme in the glutathione biosynthesis pathway. It catalyses the condensation of gamma-glutamylcysteine and glycine to form glutathione. Glutathione play an important role in a variety of biological functions, including detoxification of xenobiotics, protection of cells from oxidative damage by free radicals, and membrane transport. The protein functions as a homodimer to catalyze the second step of glutathione biosynthesis, which is the ATP-dependent conversion of gamma-L-glutamyl-L-cysteine to glutathione. Defects in Glutathione Synthetase can also cause the glutathione synthetase deficiency of erythrocytes, which is a mild form causing hemolytic anemia.