

## 32-8082: Recombinant Human Glutathione Synthetase/GSH Synthetase (C-6His)(Discontinued)

 Gene :
 GSS

 Gene ID :
 2937

 Uniprot ID :
 P48637

## Description

Source: E.coli. MW :53.45kD.

Recombinant Human GSH Synthetase is produced by our E.coli expression system and the target gene encoding Ala2-Val474 is expressed with a 6His tag at the C-terminus. 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.

## **Product Info**

Amount :	10 μg / 50 μg
Content :	Supplied as a 0.2 $\mu m$ filtered solution of 20mM TrisHCl, 200mM NaCl, pH 7.5 .
Storage condition :	Store at -20°C, stable for 6 months after receipt. Please minimize freeze-thaw cycles.
Amino Acid :	ATNWGSLLQDKQQLEELARQAVDRALAEGVLLRTSQEPTSSEVVSYAPFTLFPSLVPSALLEQAYAVQMDFNLL VDAVSQNAAFLEQTLSSTIKQDDFTARLFDIHKQVLKEGIAQTVFLGLNRSDYMFQRSADGSPALKQIEINTISAS FGGLASRTPAVHRHVLSVLSKTKEAGKILSNNPSKGLALGIAKAWELYGSPNALVLLIAQEKERNIFDQRAIENEL LARNIHVIRRTFEDISEKGSLDQDRRLFVDGQEIAVVYFRDGYMPRQYSLQNWEARLLLERSHAAKCPDIATQLA GTKKVQQELSRPGMLEMLLPGQPEAVARLRATFAGLYSLDVGEEGDQAIAEALAAPSRFVLKPQREGGGNNLY GEEMVQALKQLKDSEERASYILMEKIEPEPFENCLLRPGSPARVVQCISELGIFGVYVRQEKTLVMNKHVGHLLR TKAIEHADGGVAAGVAVLDNPYPVLEHHHHHH

## **Application Note**

**Endotoxin :** Less than 0.1 ng/ $\tilde{A}$  $\square$  $\hat{A}\mu$ g (1 IEU/ $\tilde{A}$  $\square$  $\hat{A}\mu$ g) as determined by LAL test.