

**Product Name:** KD-Validated Cystathionine Gamma-Lyase Recombinant Rabbit Monoclonal Antibody

**Catalog #:** KVAAb00742

For research use only.

## Summary

|                     |                                                                             |
|---------------------|-----------------------------------------------------------------------------|
| <b>Description</b>  | KO&KD-Validated antibody                                                    |
| <b>Host</b>         | Rabbit                                                                      |
| <b>Application</b>  | WB,FCM                                                                      |
| <b>Reactivity</b>   | Human                                                                       |
| <b>Conjugation</b>  | Unconjugated                                                                |
| <b>Modification</b> | Unmodified                                                                  |
| <b>Isotype</b>      | Rabbit IgG                                                                  |
| <b>Clonality</b>    | Rabbit mAb                                                                  |
| <b>Form</b>         | Liquid                                                                      |
| <b>Storage</b>      | Aliquot and store at -20°C (valid for 12 months). Avoid freeze/thaw cycles. |
| <b>Shipping</b>     | Ice bags                                                                    |
| <b>Buffer</b>       | Supplied in PBS (pH 7.4) containing 50% glycerol, and 0.02% sodium azide.   |
| <b>Purification</b> | Affinity purification                                                       |

## Application

|                         |                                      |
|-------------------------|--------------------------------------|
| <b>Dilution Ratio</b>   | WB 1:1,000-1:5,000; FC 1:200-1:2,000 |
| <b>Molecular Weight</b> | Calculated MW: 44.5kDa               |

## Antigen Information

|                          |                                                                                                                                                                                                                                                                            |
|--------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Gene Name</b>         | CTH                                                                                                                                                                                                                                                                        |
| <b>Alternative Names</b> | CTH; Cystathionine Gamma-Lyase; CSE; Cystathionase (Cystathionine Gamma-Lyase); Cysteine-Protein Sulfhydrase; Homocysteine Desulfhydrase; Cysteine Desulfhydrase; Gamma-Cystathionase; EC 4.4.1.1; CGL; Homoserine Dehydratase; Homoserine Deaminase; EC 4.4.1.2; EC 4.4.1 |
| <b>Gene ID</b>           | 1491.0                                                                                                                                                                                                                                                                     |
| <b>SwissProt ID</b>      | P32929                                                                                                                                                                                                                                                                     |
| <b>Immunogen</b>         | A synthesized peptide derived from human Cystathionase/CTH                                                                                                                                                                                                                 |

## Background

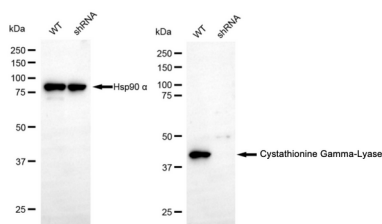
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This gene encodes a cytoplasmic enzyme in the trans-sulfuration pathway that converts cystathione derived from methionine into cysteine. Glutathione synthesis in the liver is dependent upon the availability of cysteine. Mutations in this gene cause cystathioninuria. Alternative splicing of this gene results in three transcript variants encoding different isoforms. [provided by RefSeq, Jun 2010]

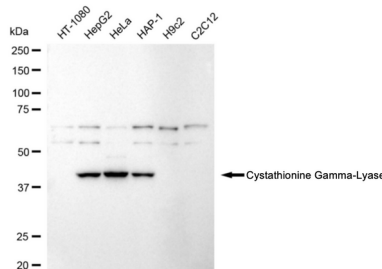
## Research Area

Signal Transduction, Metabolism

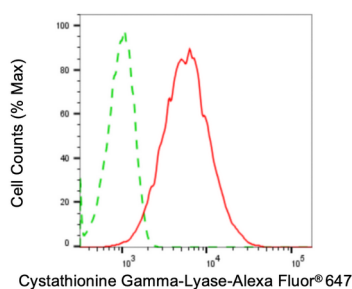
## Image Data



Western blotting analysis using cystathionine gamma-lyase antibody (KVA00742). Cystathionine gamma-lyase expression in wild type (WT) and cystathionine gamma-lyase (CTH) shRNA knockdown (KD) HeLa cells with 20  $\mu$ g of total cell lysates. Hsp90  $\alpha$  serves as a loading control. The blot was incubated with cystathionine gamma-lyase antibody (KVA00742, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (APS0635, 1:10,000) respectively.



Western blotting analysis using cystathionine gamma-lyase antibody (KVA00742). Total cell lysates (30  $\mu$ g) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with cystathionine gamma-lyase antibody (KVA00742, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody (APS0635, 1:10,000) respectively.



Flow cytometric analysis of cystathionine gamma-lyase expression in HepG2 cells using cystathionine gamma-lyase antibody (KVA00742, 1:2,000). Green, isotype control; red, Cystathionine Gamma-Lyase.