

# Glutamate--cysteine ligase Recombinant Protein | gshA recombinant protein

Recombinant Escherichia coli Glutamate--cysteine ligase

|                               |                                                                 |
|-------------------------------|-----------------------------------------------------------------|
| CATALOG #<br><b>AAA114619</b> | HOST<br><b>E Coli or Yeast or Baculovirus or Mammalian Cell</b> |
|-------------------------------|-----------------------------------------------------------------|

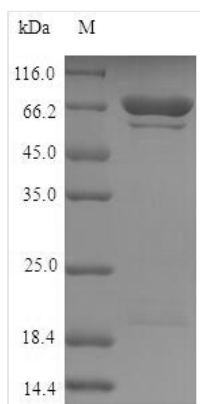
## PRODUCT SYNONYMS

Glutamate--cysteine ligase; Recombinant Escherichia coli Glutamate--cysteine ligase; Gamma-ECS; GCS; Gamma-glutamylcysteine synthetase; gshA recombinant protein

## PRODUCT SPECIFICATIONS

|                         |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |
|-------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Host                    | E Coli or Yeast or Baculovirus or Mammalian Cell                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| Purity/Purification     | Greater or equal to 85% purity as determined by SDS-PAGE.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| Form/Format             | Lyophilized or liquid (Format to be determined during the manufacturing process)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
| Sequence Positions      | 1-518aa; Full Length                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| Sequence                | MIPDVSQALA WLEKHPQALK GIQRGLERET LRVNADGTLA TTGHPEALGS ALTHKWITTD FAEALLEFIT PVDGDIEHML TFMRD LHRYT ARNMGDERMW PLSMPCYIAE GQDIELAQYG TSNTGRFKTL YREGLKNRYG ALMQTISGVH YNFSLPMAFW QAKCGDISGA DAK EKISAGY FRVIRNYYRF GWVIPYLFGA SPAICSSFLQ GKPTSLPFEK TECGMYYPY ATSLRLSDLG YTNKSQSNLG ITFNDLYEYV AGLKQAIKTP SEEYAKIGIE KDGKRLQINS NVLQIENELY APIRPKRVT R SGESPSDALL RGGIEYIEVR SLDINPFSP I GVDEQQVRFL DLFMVWCALA DAPEMSSSEL ACTRVNWN RV ILEGRKPGLT LGIGCETAQF PLPQVGKDLF RDLKRVAQTL DSINGGEAYQ KVCDELVACF DNPDLTFSAR ILRSMIDTGI GGTGKAFAEA YRNLLREEPL EILREEDFVA EREASERRQQ EMEADTEPF AVWLEKHA                                                                                                                                                                                             |
| Sequence Length         | 518                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Production Note         | <b>Special Offer:</b> The E Coli host-expressed protein is manufactured from a stock plasmid containing the protein gene. E Coli host-expressed protein is stocked in different unit sizes ranging from as small as 10 ug to as large as 1 mg. Bulk inventory is also available. The E Coli host-expressed protein has been ordered over and over again by researchers and has stood the test of time as both a robust protein and important target for the research community. It is part of our new program to make our most popular protein targets and corresponding hosts available in expanded unit sizes and with a quick processing time. Select E Coli host-expressed protein for the fastest delivery among all hosts. Please contact our <b>or email to</b> for more details. |
| Preparation and Storage | Store at -20 degree C, for extended storage, conserve at -20 degree C or -80 degree C.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |

## IMAGES



SDS-PAGE

ADDITIONAL INFORMATION

|            |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
|------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| References | The nucleotide sequence of the gene for gamma-glutamylcysteine synthetase of Escherichia coli.Watanabe K., Yamano Y., Murata K., Kimura A.Nucleic Acids Res. 14:4393-4400(1986) Construction of a contiguous 874-kb sequence of the Escherichia coli-K12 genome corresponding to 50.0-68.8 min on the linkage map and analysis of its sequence features.Yamamoto Y., Aiba H., Baba T., Hayashi K., Inada T., Isono K., Itoh T., Kimura S., Kitagawa M., Makino K., Miki T., Mitsuhashi N., Mizobuchi K., Mori H., Nakade S., Nakamura Y., Nashimoto H., Oshima T., Oyama S., Saito N., Sampei G., Satoh Y., Sivasundaram S., Tagami H., Takahashi H., Takeda J., Takemoto K., Uehara K., Wada C., Yamagata S., Horiuchi T.DNA Res. 4:91-113(1997) The complete genome sequence of Escherichia coli K-12.Blattner F.R., Plunkett G. III, Bloch C.A., Perna N.T., Burland V., Riley M., Collado-Vides J., Glasner J.D., Rode C.K., Mayhew G.F., Gregor J., Davis N.W., Kirkpatrick H.A., Goeden M.A., Rose D.J., Mau B., Shao Y.Science 277:1453-1462(1997) Highly accurate genome sequences of Escherichia coli K-12 strains MG1655 and W3110.Hayashi K., Morooka N., Yamamoto Y., Fujita K., Isono K., Choi S., Ohtsubo E., Baba T., Wanner B.L., Mori H., Horiuchi T.Mol. Syst. Biol. 2:E1-E5(2006) |
|------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

NCBI AND UNIPROT INFORMATION

|                               |                            |
|-------------------------------|----------------------------|
| NCBI GI #                     | 16130600                   |
| NCBI GeneID                   | 944881                     |
| NCBI Accession #              | NP_417173.1                |
| NCBI GenBank Nucleotide #     | NC_000913.3                |
| UniProt Accession #           | P0A6W9; P06980; P78228     |
| Molecular Weight              | 74.3 kDa                   |
| NCBI Official Full Name       | glutamate-cysteine ligase  |
| NCBI Official Symbol          | gshA                       |
| NCBI Official Synonym Symbols | ECK2683; gshI; JW2663      |
| NCBI Protein Information      | glutamate-cysteine ligase  |
| UniProt Protein Name          | Glutamate--cysteine ligase |
| UniProt Gene Name             | <b>gshA</b>                |
| UniProt Synonym Gene Names    | gsh-I; GCS                 |
| UniProt Entry Name            | GSH1_ECOLI                 |

**For Research Use Only.** Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

AAA Biotech | Tel: +1 (619) 604-9440 | Fax: +1 (619) 604-9441 | [contact@aaabiotech.com](mailto:contact@aaabiotech.com)  
Online datasheet: <https://www.aaabiotech.com/gsha-recombinant-protein-e-coli/114619>