

## **Product datasheet for PH301755**

## OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

## CBS (NM\_000071) Human Mass Spec Standard

**Product data:** 

**Product Type:** Mass Spec Standards

**Description:** CBS MS Standard C13 and N15-labeled recombinant protein (NP\_000062)

Species:HumanExpression Host:HEK293

Expression cDNA Clone

RC201755

or AA Sequence: Predicted MW:

60.6 kDa

Protein Sequence: >RC201755 protein sequence

Red=Cloning site Green=Tags(s)

MPSETPQAEVGPTGCPHRSGPHSAKGSLEKGSPEDKEAKEPLWIRPDAPSRCTWQLGRPASESPHHHTPP AKSPKILPDILKKIGDTPMVRINKIGKKFGLKCELLAKCEFFNAGGSVKDRISLRMIEDAERDGTLKPGD TIIEPTSGNTGIGLALAAAVRGYRCIIVMPEKMSSEKVDVLRALGAEIVRTPTNARFDSPESHVGVAWRL KNEIPNSHILDQYRNASNPLAHYDTTADEILQQCDGKLDMLVASVGTGGTITGIARKLKEKCPGCRIIGV DPEGSILAEPEELNQTEQTTYEVEGIGYDFIPTVLDRTVVDKWFKSNDEEAFTFARMLIAQEGLLCGGSA GSTVAVAVKAAQELQEGQRCVVILPDSVRNYMTKFLSDRWMLQKGFLKEEDLTEKKPWWHHLRVQELGLS APLTVLPTITCGHTIEILREKGFDQAPVVDEAGVILGMVTLGNMLSSLLAGKVQPSDQVGKVIYKQFKQI

RLTDTLGRLSHILEMDHFALVVHEQIQYHSTGKSSQRQMVFGVVTAIDLLNFVAAQERDQK

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Tag: C-Myc/DDK

**Purity:** > 80% as determined by SDS-PAGE and Coomassie blue staining

**Concentration:** >0.05 μg/μL as determined by microplate BCA method

Labeling Method: Labeled with [U- 13C6, 15N4]-L-Arginine and [U- 13C6, 15N2]-L-Lysine

**Buffer:** 25 mM Tris-HCl, 100 mM glycine, pH 7.3

**Storage:** Store at -80°C. Avoid repeated freeze-thaw cycles.

**Stability:** Stable for 3 months from receipt of products under proper storage and handling conditions.

RefSeq: <u>NP 000062</u>

RefSeq Size: 2609 RefSeq ORF: 1653





Synonyms: CBSL; HIP4

Locus ID: 875

UniProt ID: <u>P35520</u>, <u>P0DN79</u>, <u>Q9NTF0</u>

Cytogenetics: 21q22.3

**Summary:** The protein encoded by this gene acts as a homotetramer to catalyze the conversion of

homocysteine to cystathionine, the first step in the transsulfuration pathway. The encoded protein is allosterically activated by adenosyl-methionine and uses pyridoxal phosphate as a cofactor. Defects in this gene can cause cystathionine beta-synthase deficiency (CBSD), which can lead to homocystinuria. This gene is a major contributor to cellular hydrogen sulfide production. Multiple alternatively spliced transcript variants have been found for this gene.

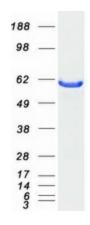
[provided by RefSeq, Feb 2016]

**Protein Families:** Druggable Genome

**Protein Pathways:** Cysteine and methionine metabolism, Glycine, serine and threonine metabolism, Metabolic

pathways, Selenoamino acid metabolism

## **Product images:**



Coomassie blue staining of purified CBS protein (Cat# [TP301755]). The protein was produced from HEK293T cells transfected with CBS cDNA clone (Cat# [RC201755]) using MegaTran 2.0 (Cat# [TT210002]).