

Product datasheet for PH319229

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

BCAT1 (NM_005504) Human Mass Spec Standard

Product data:

Product Type: Mass Spec Standards

Description: BCAT1 MS Standard C13 and N15-labeled recombinant protein (NP_005495)

Species: Human Expression Host: HEK293

Expression cDNA Clone

or AA Sequence:

RC219229

Predicted MW: 42.8 kDa

Protein Sequence: >RC219229 representing NM_005504

Red=Cloning site Green=Tags(s)

MKDCSNGCSAECTGEGGSKEVVGTFKAKDLIVTPATILKEKPDPNNLVFGTVFTDHMLTVEWSSEFGWEK PHIKPLQNLSLHPGSSALHYAVELFEGLKAFRGVDNKIRLFQPNLNMDRMYRSAVRATLPVFDKEELLEC IQQLVKLDQEWVPYSTSASLYIRPTFIGTEPSLGVKKPTKALLFVLLSPVGPYFSSGTFNPVSLWANPKY VRAWKGGTGDCKMGGNYGSSLFAQCEAVDNGCQQVLWLYGEDHQITEVGTMNLFLYWINEDGEEELATPP LDGIILPGVTRRCILDLAHQWGEFKVSERYLTMDDLTTALEGNRVREMFGSGTACVVCPVSDILYKGETI

HIPTMENGPKLASRILSKLTDIQYGREESDWTIVLS

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

Tag: C-Myc/DDK

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

Concentration: $>0.05 \mu g/\mu L$ 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: NP 005495

RefSeq Size: 8191 RefSeq ORF: 1158

Synonyms: BCATC; BCT1; ECA39; MECA39; PNAS121; PP18

Locus ID: 586



BCAT1 (NM_005504) Human Mass Spec Standard - PH319229

UniProt ID: <u>P54687</u>, <u>A0A024RAV0</u>

Cytogenetics: 12p12.1

Summary: This gene encodes the cytosolic form of the enzyme branched-chain amino acid

transaminase. This enzyme catalyzes the reversible transamination of branched-chain alphaketo acids to branched-chain L-amino acids essential for cell growth. Two different clinical disorders have been attributed to a defect of branched-chain amino acid transamination: hypervalinemia and hyperleucine-isoleucinemia. As there is also a gene encoding a mitochondrial form of this enzyme, mutations in either gene may contribute to these disorders. Alternatively spliced transcript variants have been described. [provided by RefSeq,

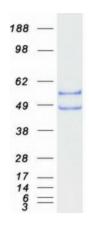
May 2010]

Protein Families: Druggable Genome

Protein Pathways: Metabolic pathways, Pantothenate and CoA biosynthesis, Valine, leucine and isoleucine

biosynthesis, Valine, leucine and isoleucine degradation

Product images:



Coomassie blue staining of purified BCAT1 protein (Cat# [TP319229]). The protein was produced from HEK293T cells transfected with BCAT1 cDNA clone (Cat# [RC219229]) using MegaTran 2.0 (Cat# [TT210002]).