PRODUCT INFORMATION

Expression system E.coli

Domain 26-102aa

UniProt No. P13987

NCBI Accession No. NP_000602

Alternative Names

CD59 glycoprotein, 16.3A5, 1F5, EJ16, EJ30, EL32, G344, HRF-20, HRF20, MAC-IP, MACIF, MEM43, MIC11, MIN1, MIN2, MIN3, MIRL, MSK21, p18-20

PRODUCT SPECIFICATION

Molecular Weight

11.3 kDa (100aa) confirmed by MALDI-TOF

Concentration 0.5mg/ml (determined by Bradford assay)

Formulation

Liquid in. 20mM Tris-HCl buffer (pH 8.0) containing 0.15M NaCl, 10% glycerol, 1mM DTT

Purity > 85% by SDS-PAGE

Tag His-Tag

Application SDS-PAGE

Storage Condition

Can be stored at +2C to +8C for 1 week. For long term storage, aliquot and store at -20C to -80C. Avoid repeated freezing and thawing cycles.

BACKGROUND

Description

CD59 is a cell surface glycoprotein that regulates complement-mediated cell lysis, and it is involved in lymphocyte signal transduction. This protein is a potent inhibitor of the complement membrane attack complex, whereby it binds complement C8 and/or C9 during the assembly of this complex, thereby inhibiting the incorporation of multiple copies of C9 into the complex, which is necessary for osmolytic pore formation. It also plays a role in signal transduction pathways in the activation of T cells. Mutations in this gene cause CD59



deficiency, a disease resulting in hemolytic anemia and thrombosis, and which causes cerebral infarction. Recombinant human CD59 protein, fused to His-tag at N-terminus, was expressed in E. coli and purified by using conventional chromatography techniques.

Amino acid Sequence

MGSSHHHHHH SSGLVPRGSH MGSLQCYNCP NPTADCKTAV NCSSDFDACL ITKAGLQVYN KCWKFEHCNF NDVTTRLREN ELTYYCCKKD LCNFNEQLEN

General References

Ninomiya H., et al (1992). J. Biol. Chem. 267: 13675-13680 Rudd P.M., et al (1997). J. Biol. Chem. 272:7229-7244

DATA



3ug by SDS-PAGE under reducing condition and visualized by coomassie blue stain.