

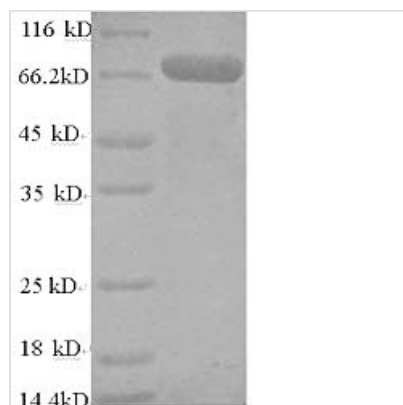


# Recombinant Human TNF receptor-associated factor 6 (TRAF6)

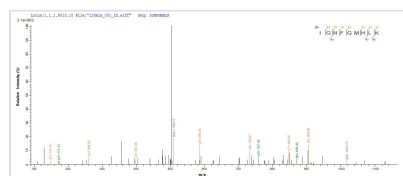
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| <b>Product Code</b>      | CSB-EP024154HU                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |
| <b>Relevance</b>         | E3 ubiquitin ligase that, together with UBE2N and UBE2V1, mediates the synthesis of 'Lys-63'-linked-polyubiquitin chains conjugated to proteins, such as IKBKG, IRAK1, AKT1 and AKT2. Also mediates ubiquitination of free/unanchored polyubiquitin chain that leads to MAP3K7 activation. Leads to the activation of NF-kappa-B and JUN. May be essential for the formation of functional osteoclasts. Ses to also play a role in dendritic cells (DCs) maturation and/or activation. Represses c-Myb-mediated transactivation, in B-lymphocytes. Adapter protein that ses to play a role in signal transduction initiated via TNF receptor, IL-1 receptor and IL-17 receptor. Regulates osteoclast differentiation by mediating the activation of adapter protein complex 1 (AP-1) and NF-kappa-B, in response to RANK-L stimulation. Together with MAP3K8, mediates CD40 signals that activate ERK in B-cells and macrophages, and thus may play a role in the regulation of immunoglobulin production |
| <b>Abbreviation</b>      | Recombinant Human TRAF6 protein                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Storage</b>           | The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Uniprot No.</b>       | Q9Y4K3                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Alias</b>             | E3 ubiquitin-protein ligase TRAF6Interleukin-1 signal transducerRING finger protein 85                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Product Type</b>      | Recombinant Protein                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| <b>Immunogen Species</b> | Homo sapiens (Human)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| <b>Purity</b>            | Greater than 90% as determined by SDS-PAGE.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>Sequence</b>          | MSLLNCENSCGSSQSESDCCVAMASSCSAVTKDDSVGGTASTGNLSSSFME<br>EIQGYDVEFDPPPLESKYECPICLMALREAVQTPCGHRFCKACIIKSIRDAGHKC<br>PVDNEILLENQLFPDNFAKREILSLMVKCPNEGCLHKMELRHLEDHQAHCFA<br>LMDCPQCQRPFQKFHINIHLKDCPRRQVSCDNCAASMAFEDKEIHDQNCPLA<br>NVICEYCNILIREQMPNHYDLDCPTAPIPCTFSTFGCHEKMQRNHLARHLQEN<br>TQSHMRMLAQAVHSLSVIPDSGYISEVRNFQETIHQLEGRQVLRQDHQIRELTAK<br>METQSMYVSELKRTIRTLEDKVAEIEAQQCNGIYWKIGNFGMHLKCQEEKPV<br>VIHSPGFYTGKPGYKLCMRLHLQLPTAQRCANYISLHVHTMQGEYDSHLPWPF<br>QGTIRLTILDQSEAPVRQNHEEIMDAKPELLAFQRPTIPRNPKGFGYVTFMHLE<br>ALRQRTFIKDDTLLVRCEVSTRFDMGSLRREGFQPRSTDAGV                                                                                                                                                                                                                                                                                                                                                                                                                               |
| <b>Research Area</b>     | Developmental Biology                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| <b>Source</b>            | E.coli                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>Target Names</b>      | TRAF6                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |

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|-------------------|-----------------------------------------------------------------------------------------------------|
| Expression Region | 1-522aa                                                                                             |
| Notes             | Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week. |
| Tag Info          | N-terminal 6xHis-SUMO-tagged                                                                        |
| Mol. Weight       | 75.6kDa                                                                                             |
| Protein Length    | Full Length                                                                                         |

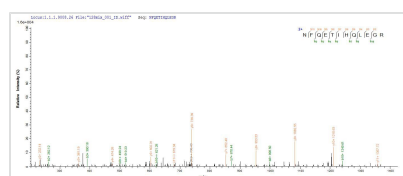
## Image



(Tris-Glycine gel) Discontinuous SDS-PAGE (reduced) with 5% enrichment gel and 15% separation gel.



Based on the SEQUEST from database of E.coli host and target protein, the LC-MS/MS Analysis result of CSB-EP024154HU could indicate that this peptide derived from E.coli-expressed Homo sapiens (Human) TRAF6.



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### Description

Amino acids 1-522 form the expressed segment for recombinant Human TRAF6. The calculated molecular weight for this TRAF6 protein is 75.6 kDa. This protein is generated in a e.coli-based system. The TRAF6 coding gene included the N-terminal 6xHis-SUMO tag, which simplifies the detection and purification processes of the recombinant TRAF6 protein in following stages of expression and purification.

TNF receptor-associated factor 6 (TRAF6) is a crucial signaling mediator within the tumor necrosis factor (TNF) receptor superfamily and Toll-like receptor (TLR) signaling pathways. TRAF6 is a multi-functional protein involved in various cellular processes, including immune response, inflammation, and bone metabolism. Its main function is to serve as an adaptor protein, facilitating the activation of downstream signaling cascades in response to receptor activation. TRAF6 plays a key role in the activation of NF- $\kappa$ B and MAPK pathways, leading to the expression of pro-inflammatory cytokines and other immune-related genes. In addition to its role in immunity, TRAF6 has implications for bone



homeostasis through its involvement in RANKL-mediated osteoclast differentiation. Dysregulation of TRAF6 signaling has been linked to autoimmune diseases, inflammatory disorders, and bone-related conditions, making it a significant target for therapeutic interventions.

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**Reconstitution**

We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Please reconstitute protein in deionized sterile water to a concentration of 0.1-1.0 mg/mL. We recommend to add 5-50% of glycerol (final concentration) and aliquot for long-term storage at -20°C/-80°C. Our default final concentration of glycerol is 50%. Customers could use it as reference.

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**Shelf Life**

The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.