

## Product datasheet for **TP504712**

### Fam49b (NM\_144846) Mouse Recombinant Protein

#### Product data:

|                                       |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
|---------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Product Type:                         | Recombinant Proteins                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| Description:                          | Purified recombinant protein of Mouse family with sequence similarity 49, member B (Fam49b), with C-terminal MYC/DDK tag, expressed in HEK293T cells, 20ug                                                                                                                                                                                                                                                                                                                            |
| Species:                              | Mouse                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| Expression Host:                      | HEK293T                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Expression cDNA Clone or AA Sequence: | >MR204712 protein sequence<br><b>Red</b> =Cloning site <b>Green</b> =Tags(s)<br><br>MGNLLKVLCTDLEQGNFFLDFENAPTESEKEIYNQVNVVLKDAEGILEDLQSYRGAGHEIREAIQHP<br>ADEKLQEKAWGAVVPLVGKLKKFYEFQSRLEAALRGLLGALTSTPYSPTQHLEREQALAKQFAEILHFTL<br>RFDELMKMTNPAIQNDFSYYRRTLSMRINNVPAGEGENEVNNELANRMSLFYAEATPMLKTLSDATTKFVS<br>ENKNLPIENTTDCLSTMASVCRVMELETPEYRSRFTNEETVSFCLRVMMGVIIYDHHVHPVGAFAKTSKID<br>MKGCIKVLKDQPPNSVEGLLNALRYTTKHLNDETTSKQIRSMQL<br><br><b>TRTRPLEQKLISEEDLAANDILDYKDDDDKV</b> |
| Tag:                                  | C-MYC/DDK                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Predicted MW:                         | 36.8 kDa                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| Concentration:                        | >0.05 µg/µL as determined by microplate BCA method                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| Purity:                               | > 80% as determined by SDS-PAGE and Coomassie blue staining                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Buffer:                               | 25 mM Tris-HCl, 100 mM glycine, pH 7.3, 10% glycerol                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| Note:                                 | For testing in cell culture applications, please filter before use. Note that you may experience some loss of protein during the filtration process.                                                                                                                                                                                                                                                                                                                                  |
| Storage:                              | Store at -80°C after receiving vials.                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| Stability:                            | Stable for 12 months from the date of receipt of the product under proper storage and handling conditions. Avoid repeated freeze-thaw cycles.                                                                                                                                                                                                                                                                                                                                         |
| RefSeq:                               | <a href="#">NP_659095</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                             |
| Locus ID:                             | 223601                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| UniProt ID:                           | <a href="#">Q921M7</a>                                                                                                                                                                                                                                                                                                                                                                                                                                                                |


[View online »](#)

|               |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|---------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| RefSeq Size:  | 3808                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |
| Cytogenetics: | 15 D1                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |
| RefSeq ORF:   | 972                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| Synonyms:     | 0910001A06Rik; AW122079                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| Summary:      | <p>Negatively regulates RAC1 signaling and RAC1-driven cytoskeletal remodeling (PubMed:31285585). Regulates chemotaxis, cell migration and epithelial polarization by controlling the polarity, plasticity, duration and extent of protrusions. Limits Rac1 mediated activation of the Scar/WAVE complex, focuses protrusion signals and regulates pseudopod complexity by inhibiting Scar/WAVE-induced actin polymerization (By similarity). Protects against Salmonella bacterial infection. Attenuates processes such as macropinocytosis, phagocytosis and cell migration and restrict sopE-mediated bacterial entry (PubMed:31285585). Restricts also infection mediated by Mycobacterium tuberculosis and Listeria monocytogenes (PubMed:31285585). Involved in the regulation of mitochondrial dynamics and oxidative stress (PubMed:29059164).[UniProtKB/Swiss-Prot Function]</p> |