

#### DESCRIPTION

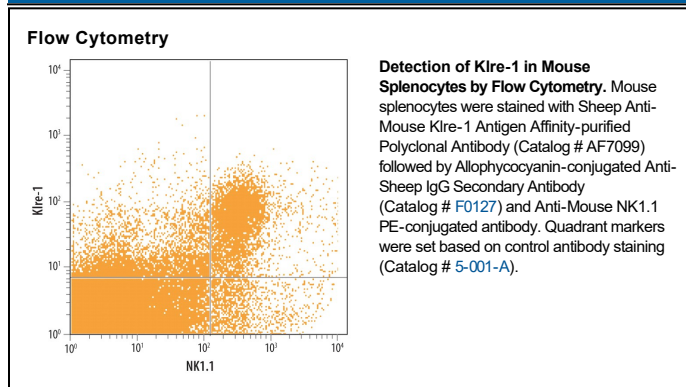
|                           |   |
|---------------------------|---|
| <b>Species Reactivity</b> | Mouse   |
| <b>Specificity</b>        | Detects mouse Klre-1 in direct ELISAs. In direct ELISAs, less than 1% cross-reactivity with recombinant human NKG2D and recombinant mouse NKG2D is observed.  |
| <b>Source</b>             | Polyclonal Sheep IgG  |
| <b>Purification</b>       | Antigen Affinity-purified   |
| <b>Immunogen</b>          | Chinese hamster ovary cell line CHO-derived recombinant mouse Klre-1<br>Lys94-Lys226<br>Accession # NP_705818   |
| <b>Formulation</b>        | Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details.<br>*Small pack size (-SP) is supplied either lyophilized or as a 0.2 µm filtered solution in PBS. |

#### APPLICATIONS

**Please Note:** Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

|                       | <b>Recommended Concentration</b>   | <b>Sample</b> |
|-----------------------|--|---------------|
| <b>Flow Cytometry</b> | 2.5 µg/10 <sup>6</sup> cells   | See Below     |
| <b>CyTOF-ready</b>    | Ready to be labeled using established conjugation methods. No BSA or other carrier proteins that could interfere with conjugation. |               |

#### DATA



#### PREPARATION AND STORAGE

|                                |  |
|--------------------------------|--|
| <b>Reconstitution</b>          | Sterile PBS to a final concentration of 0.2 mg/mL.   |
| <b>Shipping</b>                | The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.<br>*Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C   |
| <b>Stability &amp; Storage</b> | <b>Use a manual defrost freezer and avoid repeated freeze-thaw cycles.</b> <ul style="list-style-type: none"> <li>• 12 months from date of receipt, -20 to -70 °C as supplied.</li> <li>• 1 month, 2 to 8 °C under sterile conditions after reconstitution.</li> <li>• 6 months, -20 to -70 °C under sterile conditions after reconstitution.</li> </ul> |

#### BACKGROUND

NKG2I (NKG2 family member I; also Klre-1) is a 24-28 kDa member of the NKG2/KLR family of proteins. It is expressed on mouse NK and NKT cells, and appears to serve as one component of two novel heterodimeric cell surface receptors. When complexed to KLRI1, NKG2I inhibits NK cell cytotoxic activity. When complexed to KLRI2, NKG2I activates NK cells, inducing IFN-γ production and the activation of a cytolytic program. Although NKG2I preferentially associates noncovalently with NLRI1 and I2, it apparently will form disulfide-linked homodimers in the absence of its heterodimer partners. Mouse NKG2I is a 226 amino acid (aa) type II transmembrane protein. It contains an N-terminal cytoplasmic segment (aa 1-68) plus a 133 aa extracellular region (aa 94-226) that possesses one C-type lectin domain (aa 110-226). Over aa 94-226, mouse NKG2I shares 82% aa identity with rat NKG2I. There does not appear to be a human structural ortholog to mouse NKG2I.