

#### DESCRIPTION

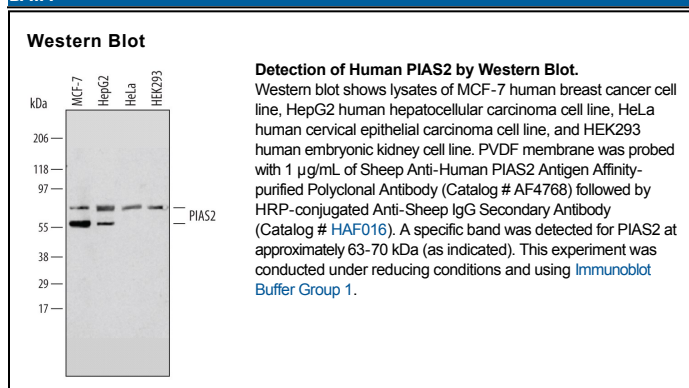
<b>Species Reactivity</b>	Human
<b>Specificity</b>	Detects human PIAS2 in Western blots.
<b>Source</b>	Polyclonal Sheep IgG
<b>Purification</b>	Antigen Affinity-purified
<b>Immunogen</b>	<i>E. coli</i> -derived recombinant human PIAS2 Met1-Gly550 Accession # O75928
<b>Formulation</b>	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied 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>Western Blot</b>	1 µg/mL	See Below

#### DATA



#### PREPARATION AND STORAGE

<b>Reconstitution</b>	Reconstitute at 0.2 mg/mL in sterile PBS.
<b>Shipping</b>	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below. *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

PIAS2 (Protein inhibitor of activated STAT2; also DIP, MIZ1 and PIASx-β) is a 45-70 kDa member of the PIAS family of molecules. In primary cells and tissues it is expressed in T and NK cells, and in testis where it likely regulates spermatogenesis. However, it is widely expressed in cultured cell lines. PIAS2 is known to inhibit STAT4-mediated gene activation, and to interact with inactive ELK-1, promoting its activation via HDAC2 dissociation and desumoylation. Human PIAS2 is 621 amino acids (aa) in length. It contains a SAP domain (aa 11-45), a zinc-finger region (aa 331-408), a SUMO-binding motif (aa 467-472) and an NLS (aa 484-492). There are multiple splice variants. PIAS2x-β/ARIP3 shows a 22 aa substitution for aa 551-621, while PIAS-NY shows a 12 aa substitution for aa 1-8, followed by a truncation after Gly401. Two others show a four aa substitution for aa 504-621, and an alternate start site at Met10. Over aa 1-550, human PIAS2 shares 98% aa identity with mouse PIAS2.