

## DESCRIPTION

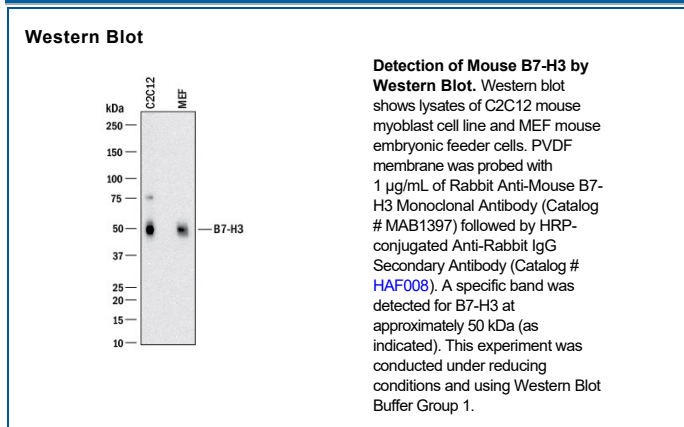
<b>Species Reactivity</b>	Mouse
<b>Specificity</b>	Detects mouse B7-H3 in direct ELISAs.
<b>Source</b>	Recombinant Monoclonal Rabbit IgG Clone # 2741D
<b>Purification</b>	Protein A or G purified from cell culture supernatant
<b>Immunogen</b>	Mouse myeloma cell line NS0-derived mouse B7-H3 Val29-Phe244 Accession # Q8VE98.1
<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 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>Western Blot</b>	1 µg/mL	C2C12 mouse myoblast cell line and MEF mouse embryonic feeder cells

## DATA



## PREPARATION AND STORAGE

<b>Reconstitution</b>	Reconstitute at 0.5 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

T cells require a signal induced by the engagement of the T cell receptor and a "costimulatory" signal(s) through distinct T cell surface molecules for optimal T cell expansion and activation. Members of the B7 superfamily of counter-receptors were identified by their ability to interact with costimulatory molecules found on the surface of T cells. Members of the B7 superfamily include B7-1 (CD80), B7-2 (CD86), B7-H1 (PD-L1), B7-H2 (B7RP-1), B7-H3, and PD-L2 (1). B7-H3 is expressed at very high levels in immature dendritic cells at moderate levels on mature dendritic cells, LPS stimulated immature dendritic cells and LPS stimulated monocytes, and at low levels on resting monocytes. B7-H3 binds to activated T cells via an as-of-yet identified receptor. B7-H3 co-stimulates proliferation of T cells and interferon-γ (IFN-γ) production and enhances the induction of cytotoxic T cells. B7-H3 shares 20 - 27% amino acid (aa) identity with other B7 family members (2). Murine B7-H3 is a 259 aa protein containing an extracellular domain, a transmembrane domain and a cytoplasmic domain. Mouse and human B7-H3 share 87% aa identity (3).

### References:

1. Coyle, A.J. and J.-C. Gutierrez-Ramos (2001) *Nature Immunol.* **2**:203.
2. Chapoval, A.I. *et al.* (2001) *Nature Immunol.* **2**:269.
3. Sun, M. *et al.* (2002) *J. Immunol.* **168**:6294.