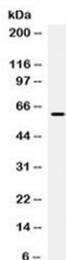


B7-H1 Antibody for WB / PD-L1 (R32579)

Catalog No.	Formulation	Size
R32579	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

[Bulk quote request](#)

Availability	1-3 business days
Species Reactivity	Human
Format	Antigen affinity purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity
Buffer	Lyophilized from 1X PBS with 2.5% BSA and 0.025% sodium azide
UniProt	Q9NZQ7
Localization	Cytoplasmic, membranous
Applications	Western Blot : 0.5-1ug/ml
Limitations	This B7-H1 antibody is available for research use only.



B7-H1 Antibody for WB. Western blot testing of human HeLa cell lysate with B7-H1 antibody at 0.5ug/ml. Expected molecular weight ~34/40-70 kDa (unmodified/glycosylated), observed here at ~62 kDa.

Description

Programmed death-ligand 1 (PD-L1), encoded by the CD274 gene, is a type I transmembrane immune checkpoint protein belonging to the B7 family of immunoregulatory molecules. B7-H1 Antibody for WB recognizes this widely studied immune checkpoint ligand, which is commonly referred to in the literature as PD-L1, CD274, or B7-H1. PD-L1 functions as the primary ligand for the programmed cell death protein 1 (PD-1) receptor expressed on activated T lymphocytes. Engagement of PD-L1 with PD-1 delivers inhibitory signals that suppress T cell proliferation, cytokine production, and

cytotoxic responses, thereby helping regulate immune activation and maintain immune tolerance in peripheral tissues.

In biochemical studies, PD-L1 is frequently analyzed using western blot assays because its expression and post-translational modification status provide valuable information about immune signaling pathways. B7-H1 Antibody for WB is particularly suited for protein detection studies focused on CD274 expression levels in cell lysates or tissue extracts. The PD-L1 protein contains extracellular immunoglobulin-like domains, a transmembrane region, and a short cytoplasmic tail. It undergoes extensive post-translational glycosylation, a modification that influences stability, trafficking, and immune checkpoint activity. As a result, western blot analysis commonly reveals multiple bands representing different glycosylated forms of the PD-L1 protein. Deglycosylation treatments in biochemical experiments frequently reduce these higher molecular weight species to the core PD-L1 protein, helping researchers confirm protein identity and modification status during experimental analysis.

The CD274 gene is located on chromosome 9p24.1 and is transcriptionally regulated by inflammatory signaling pathways. Expression of PD-L1 can be strongly induced by cytokines such as interferon-gamma, which activates transcription factors that increase CD274 expression during immune responses. In many tumor types, this pathway is exploited to increase PD-L1 expression on malignant epithelial cells, enabling tumors to suppress anti-tumor immune responses and evade immune surveillance. Because of this role in immune checkpoint signaling, western blot analysis of PD-L1 expression is commonly used in studies investigating immune regulation, inflammatory signaling, and tumor immunology.

Several well-established literature synonyms exist for this immune checkpoint ligand, including PD-L1, Programmed death-ligand 1, B7-H1, and PDCD1 ligand 1. These alternate names are frequently used across immunology, oncology, and molecular biology research. Western blot detection of CD274 using a rabbit polyclonal antibody provides a useful approach for analyzing PD-L1 protein expression and evaluating immune checkpoint pathway regulation in experimental systems. This rabbit polyclonal B7-H1 antibody is suitable for western blot detection of PD-L1 expression in research applications and is available from NSJ Bioreagents.

This PD-L1 antibody is part of a [broader PD-L1 antibody panel](#) offered by NSJ Bioreagents.

Application Notes

Optimal dilution of the B7-H1 antibody for WB should be determined by the researcher.

Immunogen

Amino acids 41-69 (KFPVEKQLDLAALIVYWEMEDKNIIQFVH-human) were used as the immunogen for the B7-H1 antibody.

Storage

After reconstitution, the B7-H1 antibody can be stored for up to one month at 4°C. For long-term, aliquot and store at -20°C. Avoid repeated freezing and thawing.