

Technical Data Sheet

PE Anti-Mouse CD274 (PD-L1) Antibody

Catalog Number: 201307, 201308

Size: 25 tests, 100 tests

Target Name: CD274, PD-L1, B7-H1

Regulatory Status: RUO

Product Details

Clone: 10F.9G2

Application: Flow Cytometry

Reactivity: Mouse

Format: PE

Isotype: Rat IgG2b

Antibody Type: Monoclonal

Formulation: Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and 0.2% (w/v) BSA

Protein Concentration: Supplied at a lot-specific concentration.

Storage and Handling: The antibody solution should be stored undiluted between 2°C and 8°C, and protected from prolonged exposure to light. Do not freeze.

Recommended Usage: For flow cytometric staining, it is recommended to use 5 µL of this reagent per 0.5-1.0 million cells in a 100 µL volume. Optimal reagent performance should be determined by titration for each specific application. PE has an excitation max at 565 nm and an emission max at 575 nm.

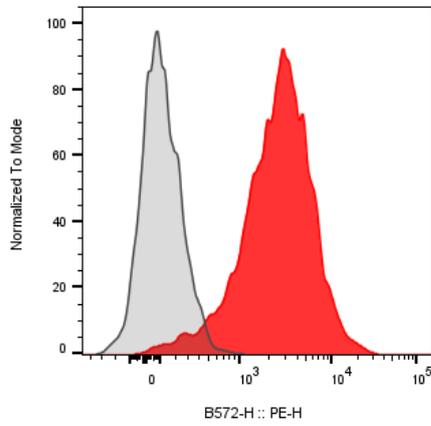
Excitation Laser: Blue Laser (488 nm) Green/Yellow laser (532/561nm)

Isotype Control: [300305](#)

Background Information

PD-L1 (Programmed Death-Ligand 1), also known as CD274 or B7-H1, is a 40 kDa type I transmembrane protein belonging to the B7 family within the immunoglobulin receptor superfamily. The protein contains immunoglobulin V-like and C-like domains and is expressed by a wide range of hematopoietic and non-hematopoietic cells, including T cells, B cells, NK cells, dendritic cells, monocytes, endothelial cells, and various tumor cells. PD-L1 serves as a ligand for PD-1 (CD279) and plays a critical role in immune regulation by inhibiting T-cell activation, proliferation, and cytokine production upon engagement with PD-1. This interaction maintains immune homeostasis during infection or inflammation, preventing autoimmunity. However, in tumor microenvironments, PD-L1 expression enables immune evasion by suppressing cytotoxic T-cell function, contributing to tumor progression. PD-L1 expression is considered prognostic in several malignancies, including colon cancer and renal cell carcinoma. Alternative splicing results in multiple transcript variants. The PD-1/PD-L1 axis is a major target in cancer immunotherapy.

Product Data



Mouse splenocytes stained with either PE Anti-Mouse PD-L1 clone 10F.9G2 PE (color-filled histogram) or an isotype control (gray histogram).