

Canine PD-L1 Monoclonal Antibody

ORDERING INFORMATION

Catalog No.	Clone No.	MAb Subtype	Size
34091	JC071	IgG1	100ug

Format: Protein G-purified antibody in PBS, pH 7.4. Concentration is lot-specific; please refer to the vial label.

BACKGROUND

Each year, thousands of dogs are diagnosed with cancer. Canine cancers bear many of the hallmarks of human cancers including tissue location, tumor progression, and response to chemotherapy and radiation. Unfortunately, canine lymphocyte populations are not as well defined as human lymphocytes, and reagents that target immune checkpoint pathways are not yet widely available for veterinary research. Interruption of the programmed death 1 (PD-1) / programmed death ligand 1 (PD-L1) pathway is an established and effective therapeutic strategy in human oncology and may be effective for treating canine cancers as well.

SPECIFICATION SUMMARY

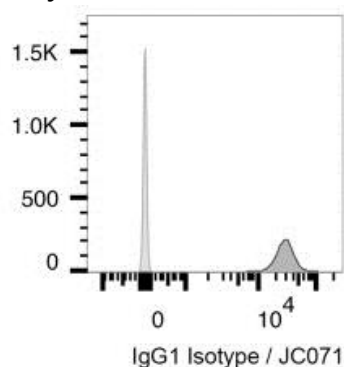
Antigen: Recombinant extracellular domain of canine PD-L1 fused with the Fc domain of human IgG1 expressed in *D. melanogaster* S2 cells.

Host Species: Mouse

Specificity: This antibody recognizes canine PD-L1.

APPLICATION

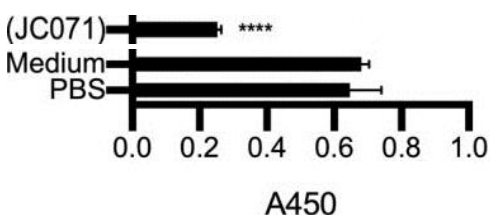
Flow cytometry



Detection of PD-L1 expression on CLGL-90 cells (Chronic Large Granular Lymphocytic-90) stained with JC071 (dark gray) vs. mouse IgA isotype control (light gray).

Endusers should determine optimal antibody concentrations for their applications.

Inhibition of PD-1 and PD-L1 Interaction



JC071 antibody added to ELISA plates coated with PD-L1 followed by the addition of biotinylated PD-1 and streptavidin-HRP. JC071 antibody blocked binding of PD-1 to PD-L1 as compared with binding of PD-1 to PD-L1 in the presence of culture medium or PBS.

Images courtesy of Dr. JW Choi, University of California, Davis.

Canine PD-L1 Monoclonal Antibody

STORAGE AND STABILITY

This antibody is stable for at least one (1) year at -20°C to -70°C. Store in appropriate aliquots to avoid multiple freeze-thaw cycles.

PRODUCT REFERENCE

Choi JW et al. 2020 *Development of canine PD-1/PD-L1 specific monoclonal antibodies and amplification of canine T cell function*. PLoS One. 2020; 15(7): e0235518.