Purified anti-human CD28 Antibody

Catalog# / Size
302901 / 25 µg
302902 / 100 µg

Clone
CD28.2

Regulatory Status
RUO

Workshop
V-CD28.05

Other Names
T44, Tp44

Isotype
Mouse IgG1, κ

Description
CD28 is a 44 kD disulfide-linked homodimeric type I glycoprotein. It is a member of the immunoglobulin superfamily and is also known as T44 or Tp44. CD28 is expressed on most T lineage cells, NK cell subsets, and plasma cells. CD28 binds both CD80 and CD86 using a highly conserved motif MYPPY in the CDR3-like loop. CD28 is considered a major co-stimulatory molecule, inducing T lymphocyte activation and IL-2 synthesis, and preventing cell death. In vitro studies indicate that ligation of CD28 on T cells by CD80 and CD86 on antigen presenting cells provides a costimulatory signal required for T cell activation and proliferation.

Product Details

Verified Reactivity
Human, Cynomolgus, Rhesus

Reported Reactivity
Baboon, Capuchin Monkey, Chimpanzee, Pigtailed Macaque, Sooty Mangabey, Squirrel Monkey

Antibody Type
Monoclonal

Host Species
Mouse

Formulation
Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.

Preparation
The antibody was purified by affinity chromatography.

Concentration
0.5 mg/ml

Storage & Handling
The antibody solution should be stored undiluted between 2°C and 8°C.

Application
FC - Quality tested
IHC-F, Costim, FA - Reported in the literature, not verified in house

Recommended Usage
Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. For flow cytometric staining, the suggested use of this reagent is ≤ 0.5 µg per 10^6 cells in 100 µl volume or 100 µl whole blood. It is recommended that the reagent be titrated for optimal performance for each application.

Application Notes
The Ultra-LEAF™ Purified antibody (Endotoxin < 0.01 EU/µg, Azide-Free, 0.2 µm filtered) is recommended for highly sensitive assays.

Application References

RRID
AB_314303 (BioLegend Cat. No. 302901)
AB_314304 (BioLegend Cat. No. 302902)

Antigen Details
Structure: Ig superfamily, type I transmembrane glycoprotein, homodimer, 44 kD
Distribution: Mature T cells, thymocytes, NK cell subsets, plasma cells, EBV-positive B cells
Function: T cell costimulation
Ligand/Receptor: CD80, CD86
Cell Type: B cells, NK cells, Plasma cells, T cells, Thymocytes, Tregs
Biology Area: Costimulatory Molecules, Immunology
Molecular Family: CD Molecules
Antigen References:
Gene ID: 940

Related Protocols
Cell Surface Flow Cytometry Staining Protocol

Other Formats

Product Data