

Anti-PDCD1 / PD-1 / CD279 Reference Antibody (pembrolizumab)

Recombinant Antibody
Catalog # APR10246

Product Information

Application	FC, Kinetics, Animal Model
Primary Accession	Q15116
Reactivity	Human
Clonality	Monoclonal
Isotype	IgG4SP
Calculated MW	31647

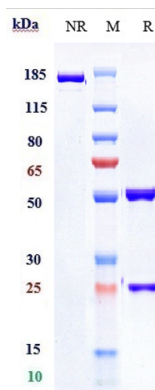
Additional Information

Target/Specificity	PDCD1 / PD-1 / CD279
Endotoxin Conjugation	Unconjugated
Expression system	CHO Cell
Format	Purified monoclonal antibody supplied in PBS, pH6.0, without preservative. This antibody is purified through a protein A column.

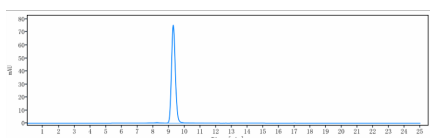
Protein Information

Name	PDCD1 {ECO:0000303 PubMed:7851902, ECO:0000312 HGNC:HGNC:8760}
Function	Inhibitory receptor on antigen activated T-cells that plays a critical role in induction and maintenance of immune tolerance to self (PubMed: 21276005 , PubMed: 37208329). Delivers inhibitory signals upon binding to ligands CD274/PDCD1L1 and CD273/PDCD1LG2 (PubMed: 21276005). Following T-cell receptor (TCR) engagement, PDCD1 associates with CD3- TCR in the immunological synapse and directly inhibits T-cell activation (By similarity). Suppresses T-cell activation through the recruitment of PTPN11/SHP-2: following ligand-binding, PDCD1 is phosphorylated within the ITSM motif, leading to the recruitment of the protein tyrosine phosphatase PTPN11/SHP-2 that mediates dephosphorylation of key TCR proximal signaling molecules, such as ZAP70, PRKCQ/PKCtheta and CD247/CD3zeta (By similarity).
Cellular Location	Cell membrane; Single-pass type I membrane protein

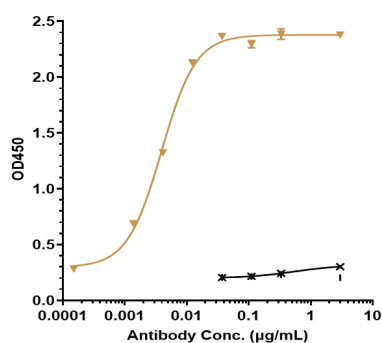
Images



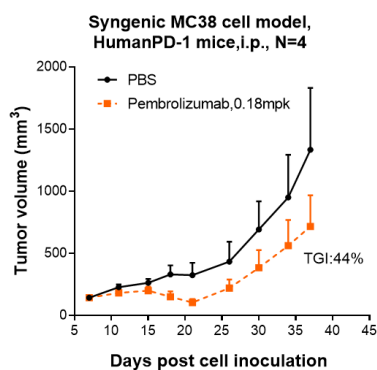
Anti-PDCD1 / PD-1 / CD279 Reference Antibody (pembrolizumab) on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 95%



The purity of Anti-PDCD1 / PD-1 / CD279 Reference Antibody (pembrolizumab) is more than 95%, determined by SEC-HPLC.



Immobilized human PD 1 His at 2 µg/mL can bind Anti-PDCD1 / PD-1 / CD279 Reference Antibody (pembrolizumab), $EC_{50}=0.0039$ µg/mL



Pembrolizumab inhibited the tumor growth of MC38 on human PD-1 mice. The result showed significant anti-tumor effects, with a tumor inhibition rate (TGI) of 44.0% at 0.18 mpk at D37.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.