For Research Use Only

## MYC tag Recombinant monoclonal antibody, PBS Only

www.ptglab.com

**Purification Method:** 

Protein A purfication

CloneNo.:

Catalog Number:80469-2-PBS

**Basic Information** 

Catalog Number:

80469-2-PBS

100ug, Concentration: 1 mg/ml by

Nanodrop: Rabbit

Isotype: IgG

Immunogen Catalog Number:

AG9409

GenBank Accession Number:

GeneID (NCBI):

**UNIPROT ID:** MYCTAG Full Name: Myc tag

241611D1

**Applications** 

**Tested Applications:** 

WB, IF/ICC, FC (Intra), IP, Indirect ELISA

Species Specificity: recombinant protein

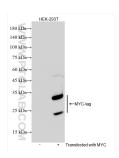
## **Background Information**

The myc-tag is a short synthetic polypeptide sequence derived from c-MYC protein that can be added to recombinant  $proteins \ to \ enable \ isolation \ and \ study \ when \ an \ antibody \ is \ not \ available. \ This \ antibody \ recognizes \ the \ MYC \ tag$ EQKLISEEDL. MYC tag is a part of c-MYC protein. So there's weaker 62-65 kDa bands for endogenous c-MYC protein. What is the molecular weight of myc? 1203Da: the ten amino acid myc tag sequence is EQKLISEEDL (in single letter code). What are the applications for myc tag? The addition of the myc tag to a particular protein can be useful when an antibody is not available to the protein of interest. Using recombinant DNA technology, the myc tag can be fused to the protein and then an antibody against the myc tag can be used to probe (PMID: 24490106). This is a reliable method and can be used in a number of different techniques, including purification using chromatography, tracking the protein in localization studies using immunofluorescence, or quantifying levels using Western Blot (PMID: 24490106). What is the structure of myc tag? The c-myc gene from which this tag is derived has a molecular weight of 49kDa, but the myc tag represents only a small portion of the C-terminus of this gene. The short polypeptide sequence can be fused to the N-terminus or the C-terminus of any protein without influencing function, although it is advised to avoid fusing it to a secretory signal. A cleavage site behind this tag is also sometimes engineered to allow removal with a specific protease.

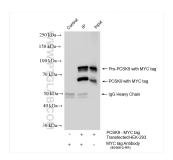
Storage

Storage: Store at -80°C. Storage Buffer: PBS only, pH7.3

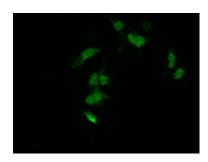
## **Selected Validation Data**



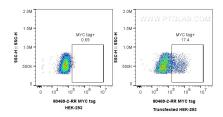
Transfected HEK-293T cells were subjected to SDS PAGE followed by western blot with 80469-2-RR (MYC tag antibody) at dilution of 1:50000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 80469-2-PBS in a different storage buffer formulation.



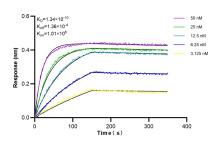
IP result of anti-MYC tag (IP:80469-2-RR, 4ug; Detection:80469-2-RR 1:5000) with Transfected HEK-293 cells lysate 1600 ug. This data was developed using the same antibody clone with 80469-2-PBS in a different storage buffer formulation.



Immunofluorescent analysis of (4% PFA) fixed Transfected HEK-293 cells using MYC tag antibody (80469-2-RR, Clone: 241611D1) at dilution of 1:250 and Coralite® 488-Conjugated Goat Anti-Rabbit IgG(H+L) (\$A00013-2). This data was developed using the same antibody clone with 80469-2-PBS in a different storage buffer formulation.



1x10^6 Transfected HEK-293 cells were intracellularly stained with 0.25 ug MYC tag Recombinant antibody (80469-2-RR, Clone:241611D1) and Coralite® 488-Conjugated Goat Anti-Rabbit 1gG(H+L) (SA00013-2), and 0.25 ug Rabbit 1gG Isotype Control RecAb (98136-1-RR, Clone: 240953C9). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer. This data was developed using the same antibody clone with 80469-2-PBS



Biolayer interferometry (BLL) kinetic assays of 80469-2-RR against MYC tag were performed. The affinity constant is 0.134 nM.