For Research Use Only

pan-RAS Recombinant antibody, PBS Only (Detector)

Catalog Number:81615-1-PBS



Purification Method:

Protein A purification

CloneNo.:

2|22

Basic Information

Catalog Number: GenBank Accession Number:

81615-1-PBS BC013572
Size: GeneID (NCBI):

 1mg/ml
 3845

 Source:
 UNIPROT ID:

 Rabbit
 P01116

Isotype: Full Name:
IgG v-Ki-ras2 Kirsten rat sarcoma viral

Immunogen Catalog Number: oncogene homolog

AG2700 Calculated MW:

188 aa, 21 kDa Observed MW: 21 kDa

Applications

Tested Applications:

WB, IHC, IF/ICC, Cytometric bead array, Indirect ELISA

Species Specificity: human, mouse, rat, pig

Background Information

The 21 kDa guanine-nucleotide binding proteins (K-Ras, H-Ras, and N-Ras) belong to the Ras oncogene family, whose members are related to the transforming genes of mammalian sarcoma retroviruses. K-Ras, H-Ras, and N-Ras have similar structure and sequences. These proteins can bind GTP and GDP, and they have intrinsic GTPase activity. The ras genes are ubiquitously expressed although mRNA analysis suggests different level expression in tissue. Mutations in each ras gene frequently were found in different tumors, suggesting their involvement in the development of specific neoplasia. This antibody can recognize K-Ras, H-Ras, and N-Ras.

Storage

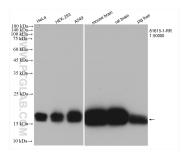
Storage:

Store at -80°C.

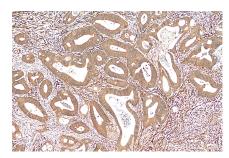
The product is shipped with ice packs. Upon receipt, store it immediately at -80°C $\,$

Storage Buffer: PBS Only

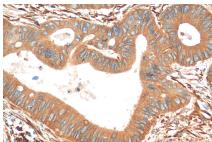
Selected Validation Data



Various lysates were subjected to SDS PAGE followed by western blot with 81615-1-RR (pan-RAS antibody) at dilution of 1:50000 incubated at room temperature for 1.5 hours. This data was developed using the same antibody clone with 81615-1-PBS in a different storage buffer formulation.



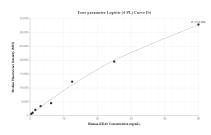
Immunohistochemical analysis of paraffinembedded human colon cancer tissue slide using 81615-1-RR (pan-RAS antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 81615-1-PBS in a different storage buffer formulation.



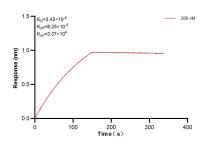
Immunohistochemical analysis of paraffinembedded human colon cancer tissue slide using 81615-1-RR (pan-RAS antibody) at dilution of 1:1000 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0). This data was developed using the same antibody clone with 81615-1-PBS in a different storage buffer formulation.



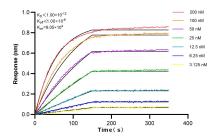
Immunofluorescent analysis of (-20°C Methanol) fixed Hela cells using pan-RAS antibody (81615-1-RR, Clone: 2122) at dilution of 1:1000 and CoraLite® 488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L). This data was developed using the same antibody clone with 81615-1-PBS in a different storage buffer formulation.



Cytometric bead array standard curve of MP80009-1, KRAS Hybrid Matched Antibody Pair, PBS Only. Capture antibody: 60309-1-PBS. Detection antibody: 81615-1-PBS. Standard: Ag2700. Range: 0.391-50 ng/mL



Biolayer interferometry (BLI) kinetic assay of 81615-1-PBS against Human pan-RAS was performed. The affinity constant is 2.45 nM.



Biolayer interferometry (BLI) kinetic assays of 81615-1-RR against Human pan-RAS were performed. The affinity constant is below 1 pM.