

## Rabbit anti-Human DPH5 Polyclonal Antibody | anti-DPH5 antibody

Anti-DPH5 Antibody Picoband

| CATALOG # | HOST   | REACTIVITY | APPLICATIONS                                                                                   |
|-----------|--------|------------|------------------------------------------------------------------------------------------------|
| AAA126603 | Rabbit | Human      | Western Blot, Immunocytochemistry, Immunofluorescence, Flow Cytometry, Functional Assay, ELISA |

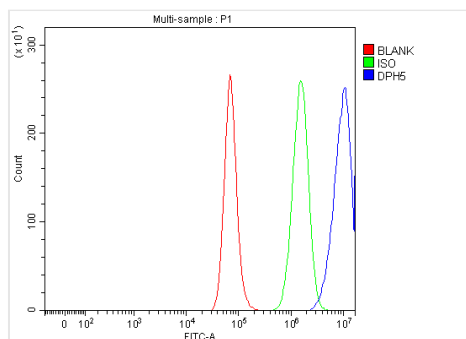
### PRODUCT SYNONYMS

DPH5; Polyclonal Antibody; Anti-DPH5 Antibody Picoband; anti-DPH5 antibody

### PRODUCT SPECIFICATIONS

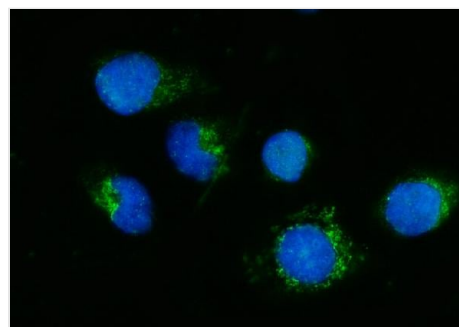
|                                                |                                                                                                                                                                                                                              |
|------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Host                                           | Rabbit                                                                                                                                                                                                                       |
| Reactivity                                     | Human                                                                                                                                                                                                                        |
| Clonality                                      | Polyclonal                                                                                                                                                                                                                   |
| Isotype                                        | Rabbit IgG                                                                                                                                                                                                                   |
| Purity/Purification                            | Immunogen affinity purified.                                                                                                                                                                                                 |
| Form/Format                                    | Lyophilized<br>Each vial contains 4 mg Trehalose, 0.9 mg NaCl, 0.2 mg Na <sub>2</sub> HPO <sub>4</sub> .                                                                                                                     |
| Concentration                                  | Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml. (varies by lot)                                                                                                                                    |
| Applicable Applications for anti-DPH5 antibody | WB (Western Blot), ICC (Immunocytochemistry), IF (Immunofluorescence), FCM/FACS (Flow Cytometry), ELISA                                                                                                                      |
| Reconstitution                                 | Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml.                                                                                                                                                    |
| Immunogen                                      | E Coli-derived human DPH5 recombinant protein (Position: D11-H250).                                                                                                                                                          |
| Preparation and Storage                        | Store at -20 degree C for one year from date of receipt. After reconstitution, at 4 degree C for one month. It can also be aliquotted and stored frozen at -20 degree C for six months. Avoid repeated freezing and thawing. |

### IMAGES



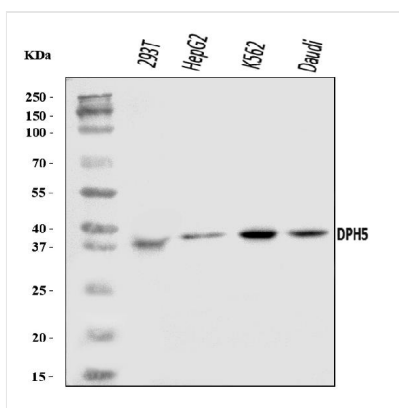
#### FCM/FACS (Flow Cytometry)

Figure 3. Flow Cytometry analysis of A549 cells using anti-DPH5 antibody (AAA126603). Overlay histogram showing A549 cells stained with AAA126603 (Blue line). The cells were blocked with 10% normal goat serum. And then incubated with rabbit anti-DPH5 Antibody (AAA126603, 1 ug/1x10<sup>6</sup> cells) for 30 min at 20 degree C. DyLight488 conjugated goat anti-rabbit IgG was used as secondary antibody for 30 minutes at 20 degree C. Isotype control antibody (Green line) was rabbit IgG (1 ug/1x10<sup>6</sup>) used under the same conditions. Unlabelled sample (Red line) was also used as a control.



#### IF (Immunofluorescence)

Figure 2. IF analysis of DPH5 using anti-DPH5 antibody (AAA126603). DPH5 was detected in an immunocytochemical section of U2OS cells. Enzyme antigen retrieval was performed using IHC enzyme antigen retrieval reagent (AR0022) for 15 mins. The cells were blocked with 10% goat serum. And then incubated with 5 ug/mL rabbit anti-DPH5 Antibody (AAA126603) overnight at 4 degree C. DyLight488 Conjugated Goat Anti-Rabbit IgG was used as secondary antibody at 1:100 dilution and incubated for 30 minutes at 37 degree C. The section was counterstained with DAPI. Visualize using a fluorescence microscope and filter sets appropriate for the label used.



#### WB (Western Blot)

Figure 1. Western blot analysis of DPH5 using anti-DPH5 antibody (AAA126603). Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel)/90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 30 ug of sample under reducing conditions. Lane 1: human 293T whole cell lysates, Lane 2: human HepG2 whole cell lysates, Lane 3: human K562 whole cell lysates, Lane 4: human Daudi whole cell lysates. After electrophoresis, proteins were transferred to a nitrocellulose membrane at 150 mA for 50-90 minutes. Blocked the membrane with 5% non-fat milk/TBS for 1.5 hour at RT. The membrane was incubated with rabbit anti-DPH5 antigen affinity purified polyclonal antibody (#AAA126603) at 0.5 ug/mL overnight at 4 degree C, then washed with TBS-0.1% Tween 3 times with 5 minutes each and probed with a goat anti-rabbit IgG-HRP secondary antibody at a dilution of 1:5000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit with Tanon 5200 system. A specific band was detected for DPH5 at approximately 37 kDa. The expected band size for DPH5 is at 32 kDa.

## ADDITIONAL INFORMATION

|                                                           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
|-----------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Related Product Information for anti-DPH5 antibody</b> | Diphthine synthase is an enzyme that in humans is encoded by the DPH5 gene. This gene encodes a component of the diphthamide synthesis pathway. Diphthamide is a post-translationally modified histidine residue found only on translation elongation factor 2. It is conserved from archaeobacteria to humans, and is targeted by diphtheria toxin and Pseudomonas exotoxin A to halt cellular protein synthesis. The yeast and Chinese hamster homologs of this protein catalyze the trimethylation of the histidine residue on elongation factor 2, resulting in a diphthine moiety that is subsequently amidated to yield diphthamide. Multiple transcript variants encoding different isoforms have been found for this gene. |
| <b>Product Categories/Family for anti-DPH5 antibody</b>   | Primary Antibodies, Rabbit Polyclonal Antibodies                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |

## NCBI AND UNIPROT INFORMATION

|                                         |                                                                                              |
|-----------------------------------------|----------------------------------------------------------------------------------------------|
| <b>NCBI GI #</b>                        | 119593346                                                                                    |
| <b>NCBI GeneID</b>                      | 51611                                                                                        |
| <b>UniProt Accession #</b>              | Q9H2P9; Q9P017; Q9P014; Q9Y319; A8JZY6; D3DT62                                               |
| <b>Molecular Weight</b>                 | 31,651 Da                                                                                    |
| <b>NCBI Official Full Name</b>          | DPH5 homolog (S. cerevisiae), isoform CRA_b                                                  |
| <b>NCBI Official Synonym Full Names</b> | diphthamide biosynthesis 5                                                                   |
| <b>NCBI Official Symbol</b>             | DPH5                                                                                         |
| <b>NCBI Official Synonym Symbols</b>    | AD-018; CGI-30; NPD015; HSPC143                                                              |
| <b>NCBI Protein Information</b>         | diphthine synthase; DPH5 homolog; protein x 0011; diphthamide biosynthesis methyltransferase |
| <b>UniProt Protein Name</b>             | Diphthine synthase                                                                           |
| <b>UniProt Gene Name</b>                | DPH5                                                                                         |

**For Research Use Only.** Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

AAA Biotech | Tel: +1 (619) 604-9440 | Fax: +1 (619) 604-9441 | [contact@aaabiotech.com](mailto:contact@aaabiotech.com)

Online datasheet: <https://www.aaabiotech.com/polyclonal/dph5-antibody-western-blot-immunocytochemistry-immunofluorescence-flow-cytometry-elisa/126603>