# **BioVision**

# PI3Kβ, Rabbit pAb

**CATALOG #:** 3146-100

**AMOUNT**: 100 μg

LOT#:

HOST (ISOTYPE): Rabbit (Ig)

**IMMUNOGEN:** KLH conjugated synthetic peptide selected from the N-

terminal region of human PI3Kβ.

SPECIES REACTIVITY: Human

### FORMULATION:

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein G column, eluted with high and low pH buffers and neutralized immediately, followed by dialysis against PBS.

#### STORAGE CONDITIONS:

Maintain refrigerated at 2-8°C for up to 6 months or -20°C for long term storage.

#### BACKGROUND DESCRIPTION:

Protein kinases are enzymes that transfer a phosphate group from a phosphate donor, generally the g phosphate of ATP, onto an acceptor amino acid in a substrate protein. By this basic mechanism, protein kinases mediate most of the signal transduction in eukaryotic cells, regulating cellular metabolism, transcription, cell cycle progression, cytoskeletal rearrangement and cell movement, apoptosis, and differentiation. With more than 500 gene products, the protein kinase family is one of the largest families of proteins in eukaryotes. The family has been classified in 8 major groups based on sequence comparison of their tyrosine (PTK) or serine/threonine (STK) kinase catalytic domains.

#### **BACKGROUND REFERENCES:**

- 1. Brock, C., et al., J. Cell Biol. 160(1):89-99 (2003).
- 2. Kossila, M., et al., Diabetes Care 26(1):179-182 (2003).
- 3. Yart, A., et al., J. Biol. Chem. 277(24):21167-21178 (2002).
- 4. Ueki, K., et al., Proc. Natl. Acad. Sci. U.S.A. 99(1):419-424 (2002).
- 5. Sotsios, Y., et al., J. Immunol. 163(11):5954-5963 (1999).

## **OTHER NAMES:**

Phosphatidylinositol-4,5-bisphosphate 3-kinase catalytic subunit, beta isoform; PI3-kinase p110 subunit beta; PIK3CB

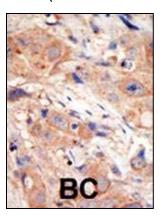
#### SPECIFICITY:

The antibody detects a  $\sim$  123 kDa band, corresponding to the expected molecular mass of PIK3C $\beta$  on immunoblots.

## APPLICATION (suggested concentration):

The antibody can be used for ELISA (0.25 μg/ml), Immunohistochemistry (2.5 – 5 μg/ml).

## APPLICATION DATA (Calculated MW = 122762 Da):



Formalin-fixed and paraffin-embedded human cancer tissue reacted with the primary antibody, which was peroxidase-conjugated to the secondary antibody, followed by AEC staining. BC = breast carcinoma.

### **RELATED PRODUCTS:**

Apoptosis Detection Kits & Reagents

- Annexin V Kits & Bulk Reagents
- Caspase Assay Kits & Reagents
- Mitochondrial Apoptosis Kits & Reagents
- Nuclear Apoptosis Kits & Reagents
- Apoptosis Inducers and Set
- Apoptosis siRNA Vectors

#### Cell Fractionation System

- Mitochondria/Cytosol Fractionation Kit
- Nuclear/Cytosol Fractionation Kit
- Membrane Protein Extraction Kit
- Cytosol/Particulate Rapid Separation Kit
- Mammalian Cell Extraction Kit
- FractionPREP Fractionation System

