

# PI 3 Kinase Class 3 Polyclonal Antibody

Catalog # AP73942

### **Product Information**

Application WB
Primary Accession <u>Q8NEB9</u>

**Reactivity** Human, Mouse, Rat, Bovine, Pig

HostRabbitClonalityPolyclonalCalculated MW101549

#### **Additional Information**

**Gene ID** 5289

**Other Names** phosphoinositide-3-kinase, class 3

**Dilution** WB~~WB 1:500-2000, ELISA 1:10000-20000

Format Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium

azide.

Storage Conditions -20°C

### **Protein Information**

Name PIK3C3 ( <u>HGNC:8974</u>)

**Synonyms** VPS34 {ECO:0000305}

**Function** Catalytic subunit of the PI3K complex that mediates formation of

phosphatidylinositol 3-phosphate; different complex forms are believed to play a role in multiple membrane trafficking pathways: PI3KC3-C1 is involved

in initiation of autophagosomes and PI3KC3-C2 in maturation of

autophagosomes and endocytosis (PubMed:<u>14617358</u>, PubMed:<u>33637724</u>, PubMed:<u>7628435</u>). As part of PI3KC3-C1, promotes endoplasmic reticulum membrane curvature formation prior to vesicle budding (PubMed:<u>32690950</u>). Involved in regulation of degradative endocytic trafficking and required for the abscission step in cytokinesis, probably in the context of PI3KC3-C2 (PubMed:<u>20208530</u>, PubMed:<u>20643123</u>). Involved in the transport of lysosomal enzyme precursors to lysosomes (By similarity). Required for transport from early to late endosomes (By similarity).

**Cellular Location** Midbody. Late endosome. Cytoplasmic vesicle, autophagosome. Note=As

component of the PI3K complex I localized to pre-autophagosome structures. As component of the PI3K complex II localized predominantly to endosomes (PubMed:14617358). Also localizes to discrete punctae along the ciliary

axoneme and to the base of the ciliary axoneme (By similarity) {ECO:0000250|UniProtKB:Q6PF93, ECO:0000305|PubMed:14617358}

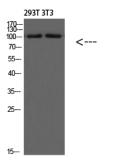
**Tissue Location** 

Ubiquitously expressed, with a highest expression in skeletal muscle.

## **Background**

Catalytic subunit of the PI3K complex that mediates formation of phosphatidylinositol 3-phosphate; different complex forms are believed to play a role in multiple membrane trafficking pathways: PI3KC3-C1 is involved in initiation of autophagosomes and PI3KC3-C2 in maturation of autophagosomes and endocytosis. Involved in regulation of degradative endocytic trafficking and required for the abcission step in cytokinesis, probably in the context of PI3KC3-C2 (PubMed:20643123, PubMed:20208530). Involved in the transport of lysosomal enzyme precursors to lysosomes. Required for transport from early to late endosomes (By similarity).

## **Images**



Western Blot analysis of 293T 3T3 cells using PI 3 Kinase Class 3 Polyclonal Antibody diluted at 1:1500. Secondary antibody was diluted at 1:20000

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