

# Anti-GPR49 / LGR5 Reference Antibody (BNC101)

Recombinant Antibody Catalog # APR10228

### **Specification**

### Anti-GPR49 / LGR5 Reference Antibody (BNC101) - Product Information

Application
Primary Accession
Reactivity
Clonality
Isotype
Calculated MW

FC, Kinetics, Animal Model
075473
Human, Mouse
Monoclonal
IgG1
150 KDa

# Anti-GPR49 / LGR5 Reference Antibody (BNC101) - Additional Information

Target/Specificity GPR49 / LGR5

**Endotoxin** 

< 0.001EU/ µg,determined by LAL method.

**Conjugation** Unconjugated

**Expression system** 

CHO Cell

### **Format**

Purified monoclonal antibody supplied in PBS, pH6.0, without preservative. This antibody is purified through a protein A column.

# Anti-GPR49 / LGR5 Reference Antibody (BNC101) - Protein Information

Name LGR5

Synonyms GPR49, GPR67

#### **Function**

Receptor for R-spondins that potentiates the canonical Wnt signaling pathway and acts as a stem cell marker of the intestinal epithelium and the hair follicle. Upon binding to R-spondins (RSPO1, RSPO2, RSPO3 or RSPO4), associates with phosphorylated LRP6 and frizzled receptors that are activated by extracellular Wnt receptors, triggering the canonical Wnt signaling pathway to increase expression of target genes. In contrast to classical G-protein coupled receptors, does not activate heterotrimeric G-proteins to transduce the signal. Involved in the development and/or maintenance of the adult intestinal stem cells during postembryonic development.

#### **Cellular Location**

Cell membrane; Multi-pass membrane protein. Golgi apparatus, trans-Golgi network membrane;





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Multi-pass membrane protein Note=Rapidly and constitutively internalized to the trans-Golgi network at steady state. Internalization to the trans-Golgi network may be the result of phosphorylation at Ser-861 and Ser-864; however, the phosphorylation event has not been proven (PubMed:23439653)

#### **Tissue Location**

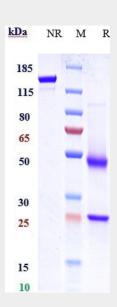
Expressed in skeletal muscle, placenta, spinal cord, and various region of brain. Expressed at the base of crypts in colonic and small mucosa stem cells. In premalignant cancer expression is not restricted to the cript base. Overexpressed in cancers of the ovary, colon and liver.

### Anti-GPR49 / LGR5 Reference Antibody (BNC101) - Protocols

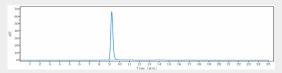
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

# Anti-GPR49 / LGR5 Reference Antibody (BNC101) - Images



Anti-GPR49 / LGR5 Reference Antibody (BNC101) on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 95%



The purity of Anti-GPR49 / LGR5 Reference Antibody (BNC101)is more than 95%, determined by SEC-HPLC.