

## R-Spondin Monoclonal Antibody

|                              |   |
|------------------------------|---|
| <b>Catalog No :</b>          | YM0566  |
| <b>Reactivity :</b>          | Human   |
| <b>Applications :</b>        | WB;ELISA  |
| <b>Target :</b>              | R-Spondin   |
| <b>Fields :</b>              | >>Wnt signaling pathway   |
| <b>Gene Name :</b>           | RSPO1   |
| <b>Protein Name :</b>        | R-spondin-1   |
| <b>Human Gene Id :</b>       | 284654  |
| <b>Human Swiss Prot No :</b> | Q2MKA7  |
| <b>Mouse Swiss Prot No :</b> | Q9Z132  |
| <b>Immunogen :</b>           | Purified recombinant fragment of R-spondin1 expressed in E. Coli.             |
| <b>Specificity :</b>         | R-Spondin Monoclonal Antibody detects endogenous levels of R-Spondin protein. |
| <b>Formulation :</b>         | Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.       |
| <b>Source :</b>              | Monoclonal, Mouse   |
| <b>Dilution :</b>            | WB 1:500 - 1:2000. ELISA: 1:10000. Not yet tested in other applications.      |
| <b>Purification :</b>        | Affinity purification   |
| <b>Storage Stability :</b>   | -15°C to -25°C/1 year(Do not lower than -25°C)                                |
| <b>Molecularweight :</b>     | 29kD  |

**P References :**

1. Nat Genet. 2006 Nov;38(11):1304-9.
2. Hum Mutat. 2008 Feb;29(2):220-6.

**Background :**

This gene encodes a secreted activator protein with two cysteine-rich, furin-like domains and one thrombospondin type 1 domain. The encoded protein is a ligand for leucine-rich repeat-containing G-protein coupled receptors (LGR proteins) and positively regulates the Wnt signaling pathway. In mice, the protein induces the rapid onset of crypt cell proliferation and increases intestinal epithelial healing, providing a protective effect against chemotherapy-induced adverse effects. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Apr 2014],

**Function :**

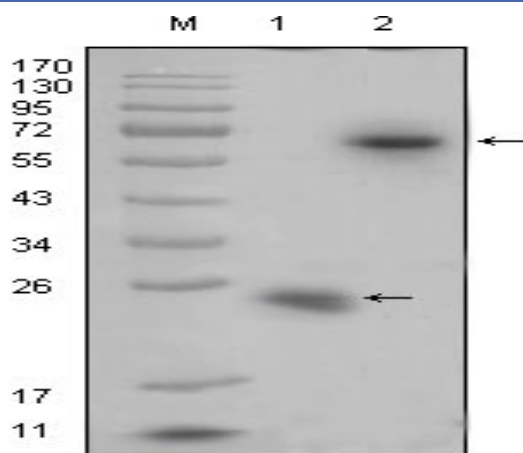
disease:Defects in RSPO1 are the cause of palmoplantar keratoderma with squamous cell carcinoma of skin and sex reversal (PKKSCC) [MIM:610644]. This recessive syndrome is characterized by XX (female to male) SRY-independent sex reversal, palmoplantar hyperkeratosis and predisposition to squamous cell carcinoma of the skin.,domain:The FU repeats are required for activation and stabilization of beta-catenin.,function:Activator of the beta-catenin signaling cascade, leading to TCF-dependent gene activation. Acts both in the canonical Wnt/beta-catenin-dependent pathway, possibly via a direct interaction with Wnt proteins, and in a Wnt-independent beta catenin pathway through a receptor signaling pathway that may not use frizzled/LRP receptors. Acts as a ligand for frizzled FZD8 and LRP6. May negatively regulate the TGF-beta pathway. Has a essential roles in ovary determination.,miscellaneous

**Subcellular Location :**

Secreted . Nucleus . Seems to mainly localize to nucleoli. .

**Expression :**

Abundantly expressed in adrenal glands, ovary, testis, thyroid and trachea but not in bone marrow, spinal cord, stomach, leukocytes colon, small intestine, prostate, thymus and spleen.

**Products Images**


Western Blot analysis using R-Spondin Monoclonal Antibody against recombinant R-spondin1 protein (1) and R-spondin1(aa21-263)-hlgGFc transfected HEK293 cell lysate(2).