

Anti-FSH Receptor Picoband Antibody

Catalog # ABO11683

Product Information

Application	WB
Primary Accession	P23945
Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Format	Lyophilized
Description	Rabbit IgG polyclonal antibody for Follicle-stimulating hormone receptor(FSH-R)(FSHR) detection. Tested with WB in Human;Mouse;Rat.

Reconstitution Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Additional Information

Gene ID	2492
Other Names	Follicle-stimulating hormone receptor, FSH-R, Follitropin receptor, FSHR, LGR1
Calculated MW	78238
Application Details	Western blot, 0.1-0.5 µg/ml, Human, Mouse, Rat
Subcellular Localization	Cell membrane; Multi-pass membrane protein.
Tissue Specificity	Sertoli cells and ovarian granulosa cells.
Source	Eukaryota
Protein Name	Follicle-stimulating hormone receptor(FSH-R)
Contents	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na ₂ HPO ₄ , 0.05mg NaN ₃ .
Immunogen	E. coli-derived human FSH Receptor recombinant protein (Position: C18-N187). Human FSH Receptor shares 91.2% and 90% amino acid (aa) sequence identity with mouse and rat FSH Receptor, respectively.
Purification	Immunogen affinity purified.
Cross Reactivity	No cross reactivity with other proteins.
Storage	At -20 °C for one year. After reconstitution, at 4 °C for one month. It can also be aliquotted and stored frozen at -20 °C for a longer time. Avoid repeated freezing and thawing.

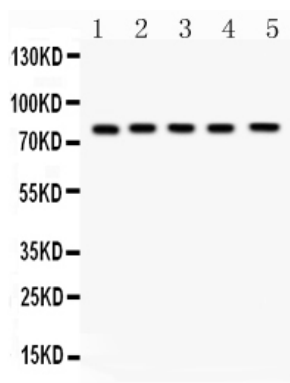
Protein Information

Name	FSHR
Synonyms	LGR1
Function	G protein-coupled receptor for follitropin, the follicle-stimulating hormone (PubMed: 11847099 , PubMed: 24058690 , PubMed: 24692546). Mediates FSH signaling through cAMP/protein kinase A (PKA) and phosphatidylinositol-3 kinase (PI3K)/protein kinase B (AKT) pathways to regulate ovarian follicular development and steroidogenesis (PubMed: 24058690). Has diverse extragonadal functions: signals via a GNAI2-coupled FSHR on osteoclasts and their precursors, resulting in activation of MEK/ERK, NF-kappa-B, and AKT pathways and thus increases osteoclastogenesis and bone resorption (By similarity). Regulates glucose-stimulated insulin secretion in pancreatic beta-cells in a bell curve manner, with moderate FSH levels promoting insulin secretion via G α q/cAMP/PKA pathways while high FSH levels inhibit this effect through G α i coupling (By similarity). In adipose tissue, inhibits thermogenesis by suppressing UCP1 expression and promotes lipogenesis via CREB/PPAR γ pathways (By similarity). Also affects hepatic cholesterol metabolism by increasing serum total and low-density-lipoprotein cholesterol (LDL-C) by inhibiting the expression of LDL receptor (LDLR) (PubMed: 26583582).
Cellular Location	Cell membrane; Multi-pass membrane protein
Tissue Location	Sertoli cells and ovarian granulosa cells.

Background

The follicle-stimulating hormone receptor or FSH receptor (FSHR) is a transmembrane receptor that interacts with the follicle-stimulating hormone (FSH) and represents a G protein-coupled receptor (GPCR). This FSHR gene is mapped to chromosome 2p21 by fluorescence in situ hybridization. The protein encoded by this gene belongs to family 1 of G-protein coupled receptors. It is the receptor for follicle stimulating hormone and functions in gonad development. Mutations in this gene cause ovarian dysgenesis type 1, and also ovarian hyperstimulation syndrome. Alternative splicing results in multiple transcript variants.

Images



Western blot analysis of FSH Receptor expression in rat testis extract (lane 1), rat ovary extract (lane 2), mouse testis extract (lane 3), mouse ovary extract (lane 4) and HELA whole cell lysates (lane 5). FSH Receptor at 78KD was detected using rabbit anti-FSH Receptor Antigen Affinity purified polyclonal antibody (Catalog # ABO11683) at 0.5 μ g/mL. The blot was developed using chemiluminescence (ECL) method.