

GRAIL (H-91): sc-292308

BACKGROUND

GRAIL, also known as RING finger protein 128, is a 428 amino acid type I transmembrane protein localized to the intracytoplasmic membrane. GRAIL contains a protease-associated (PA) domain and a RING finger domain, which binds to E2 ubiquitin-conjugating enzymes. When under anergic conditions, GRAIL functions as an E3 ubiquitin-protein ligase that inhibits IL-2, IL-4 and various other cytokines. GRAIL is also thought to be involved in the patterning of the dorsal ectoderm during development. Expressed in an asymmetric perinuclear punctate manner, GRAIL colocalizes with Rab 7, GRP 78 and Syntaxin 5. GRAIL is expressed as two isoforms produced by alternative splicing.

REFERENCES

1. Online Mendelian Inheritance in Man, OMIM™. 2003. Johns Hopkins University, Baltimore, MD. MIM Number: 300439. World Wide Web URL: <http://www.ncbi.nlm.nih.gov/omim/>
2. Anandasabapathy, N., et al. 2003. GRAIL: an E3 ubiquitin ligase that inhibits cytokine gene transcription is expressed in anergic CD4⁺ T cells. *Immunity* 18: 535-547.

CHROMOSOMAL LOCATION

Genetic locus: RNF128 (human) mapping to Xq22.3; Rnf128 (mouse) mapping to X F1.

SOURCE

GRAIL (H-91) is a rabbit polyclonal antibody raised against amino acids 338-428 mapping at the C-terminus of GRAIL of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

GRAIL (H-91) is recommended for detection of GRAIL of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

GRAIL (H-91) is also recommended for detection of GRAIL in additional species, including equine, canine and porcine.

Suitable for use as control antibody for GRAIL siRNA (h): sc-90884, GRAIL siRNA (m): sc-145748, GRAIL shRNA Plasmid (h): sc-90884-SH, GRAIL shRNA Plasmid (m): sc-145748-SH, GRAIL shRNA (h) Lentiviral Particles: sc-90884-V and GRAIL shRNA (m) Lentiviral Particles: sc-145748-V.

GRAIL (H-91) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

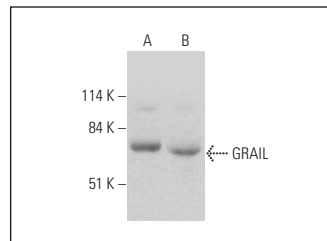
Molecular Weight of glycosylated GRAIL: 46/66 kDa.

Positive Controls: human kidney extract: sc-363764.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

DATA



GRAIL (H-91): sc-292308. Western blot analysis of GRAIL expression in human kidney (A) and human ovary (B) tissue extracts.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.


 MONOS
Satisfaction
Guaranteed

Try **GRAIL (G-7): sc-515110**, our highly recommended monoclonal alternative to GRAIL (H-91).