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SCF (KITLG) Antibody (C-term)
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP1484b

Specification

SCF (KITLG) Antibody (C-term) - Product Information

Application	**IF, WB, FC,E**
Primary Accession	P21583
Other Accession	Q29030, Q28132, Q95MD2
Reactivity	**Human**
Predicted	**Bovine, Horse, Pig**
Host	**Rabbit**
Clonality	**Polyclonal**
Isotype	**Rabbit IgG**
Antigen Region	**244-273**

SCF (KITLG) Antibody (C-term) - Additional Information

Gene ID 4254

Other Names
Kit ligand, Mast cell growth factor, MGF, Stem cell factor, SCF, c-Kit ligand, Soluble KIT ligand, sKITLG, KITLG, MGF, SCF

Target/Specificity
This SCF (KITLG) antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 244-273 amino acids from the C-terminal region of human SCF (KITLG).

Dilution
IF~~1:10~50
WB~~1:1000
FC~~1:10~50

Format
Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation followed by dialysis against PBS.

Storage
Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions
SCF (KITLG) Antibody (C-term) is for research use only and not for use in diagnostic or therapeutic procedures.

SCF (KITLG) Antibody (C-term) - Protein Information

Name KITLG (HGNC:6343)

Synonyms MGF, SCF

Function Ligand for the receptor-type protein-tyrosine kinase KIT. Plays an essential role in the regulation of cell survival and proliferation, hematopoiesis, stem cell maintenance, gametogenesis, mast cell development, migration and function, and in melanogenesis. KITLG/SCF binding can activate several signaling pathways. Promotes phosphorylation of PIK3R1, the regulatory subunit of phosphatidylinositol 3-kinase, and subsequent activation of the kinase AKT1. KITLG/SCF and KIT also transmit signals via GRB2 and activation of RAS, RAF1 and the MAP kinases MAPK1/ERK2 and/or MAPK3/ERK1. KITLG/SCF and KIT promote activation of STAT family members STAT1, STAT3 and STAT5. KITLG/SCF and KIT promote activation of PLCG1, leading to the production of the cellular signaling molecules diacylglycerol and inositol 1,4,5-trisphosphate. KITLG/SCF acts synergistically with other cytokines, probably interleukins.

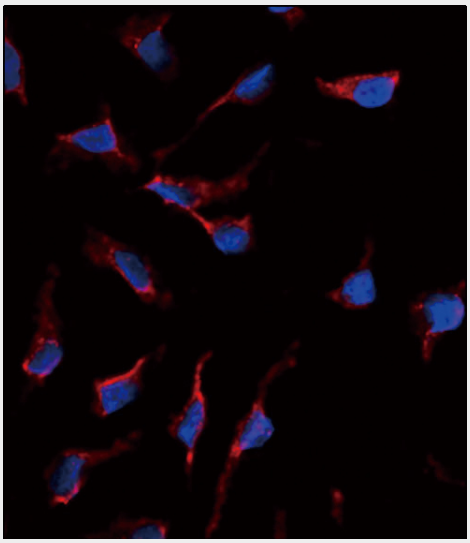
Cellular Location
[Isoform 1]: Cell membrane; Single-pass type I membrane protein [Soluble KIT ligand]: Secreted.

SCF (KITLG) Antibody (C-term) - Protocols

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

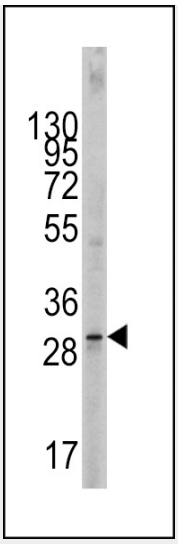
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

SCF (KITLG) Antibody (C-term) - Images

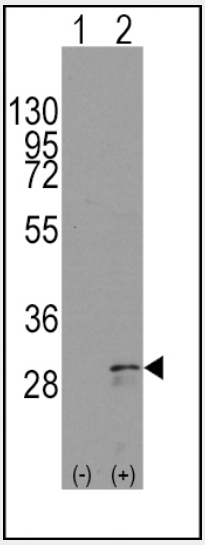


Immunofluorescence analysis of anti-KITLG Antibody (C-term) (Cat.#AP1484b) in HeLa cells. 0.025 mg/ml primary antibody was followed by Alexa-Fluor-546-conjugated donkey anti-rabbit IgG (H+L). Alexa-Fluor-546 emits orange fluorescence. Blue counterstaining is DAPI.

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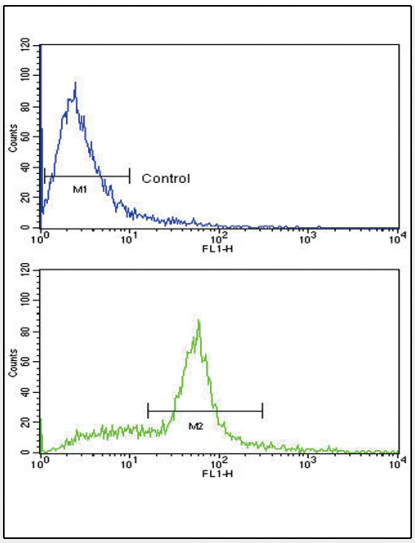


Western blot analysis of KITLG Antibody (C-term) (Cat.#AP1484b) in 293 cell line lysates (35ug/lane). KITLG (arrow) was detected using the purified Pab.



Western blot analysis of KITLG(arrow) using rabbit polyclonal KITLG Antibody (C-term) (Cat.#AP1484b). 293 cell lysates (2 ug/lane) either nontransfected (Lane 1) or transiently transfected with the KITLG gene (Lane 2) (Origene Technologies).

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Flow cytometric analysis of WiDr cells using SCF (KITLG) Antibody (C-term)(bottom histogram) compared to a negative control cell (top histogram). FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

SCF (KITLG) Antibody (C-term) - Background

KITLG is the ligand of the tyrosine-kinase receptor encoded by the KIT locus. This ligand is a pleiotropic factor that acts in utero in germ cell and neural cell development, and hematopoiesis, all believed to reflect a role in cell migration. In adults, it functions pleiotropically, while mostly noted for its continued requirement in hematopoiesis.

SCF (KITLG) Antibody (C-term) - References

Young,S.M., Cell. Signal. 19 (12), 2572-2581 (2007)
Pick,M., Stem Cells 25 (9), 2206-2214 (2007)
Yasuda,A., Dig. Dis. Sci. 52 (9), 2292-2300 (2007)