

Rabbit DTR/HBEGF Polyclonal Antibody | anti-HBEGF antibody

Anti-DTR/HBEGF Antibody Picoband

CATALOG #	HOST	REACTIVITY	APPLICATIONS
AAA19433	Rabbit	Human, Mouse, Rat	Flow Cytometry, Functional Assay, Immunofluorescence, Immunohistochemistry, Western Blot

PRODUCT SYNONYMS

DTR/HBEGF; Polyclonal Antibody; Anti-DTR/HBEGF Antibody Picoband; anti-HBEGF antibody

PRODUCT SPECIFICATIONS

Host	Rabbit
Reactivity	Human, Mouse, Rat
Clonality	Polyclonal
Isotype	Rabbit IgG
Specificity	Natural and recombinant Mouse CHI3L1
Purity/Purification	Immunogen affinity purified.
Form/Format	Lyophilized Each vial contains 4 mg Trehalose, 0.9 mg NaCl, 0.2 mg Na ₂ HPO ₄ .
Concentration	Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml. (varies by lot)
Applicable Applications for anti-HBEGF antibody	FCM/FACS (Flow Cytometry), IF (Immunofluorescence), IHC (Immunohistochemistry), WB (Western Blot)
Application Notes	WB: 0.25-0.5 ug/ml, Human, Mouse, Rat IHC-P: 2-5 ug/ml, Human, Mouse, Rat IF: 5 ug/ml, Human FC/FACS: 1-3 ug/1x10 ⁶ cells, Human Tested Species: In-house tested species with positive results. Enhanced Chemiluminescent Kit with anti-Rabbit IgG for Western blot, and HRP Conjugated anti-Rabbit IgG Super Vision Assay Kit for IHC(P).
Assay Type	Sandwich
Samples	Cell culture supernatants, cell lysates, serum and plasma (heparin, EDTA)
Detection Range	62.5 pg/ml - 4,000 pg/ml
Sensitivity	<10 pg/ml
Intra-assay Precision	Intra-Assay Precision (Precision within an assay): Three samples of known concentration were tested on one plate to assess intra-assay precision.
Inter-assay Precision	Inter-Assay Precision (Precision across assays): Three samples of known concentration were tested in separate assays to assess inter-assay precision.
Preparation and Storage	Store at -20 degree C for one year from date of receipt. After reconstitution, at 4 degree C for one month. It can also be aliquotted and stored frozen at -20 degree C for six months. Avoid repeated freezing and thawing.



FCM (Flow Cytometry)

Figure 7. Flow Cytometry analysis of Jurkat cells using anti-DTR/HBEGF antibody (AAA19433). Overlay histogram showing Jurkat cells stained with AAA19433 (Blue line). The cells were blocked with 10% normal goat serum. And then incubated with rabbit anti-DTR/HBEGF Antibody (AAA19433, 1 ug/1x10⁶ cells) for 30 min at 20 degree C. DyLight488 conjugated goat anti-rabbit IgG was used as secondary antibody for 30 minutes at 20 degree C. Isotype control antibody (Green line) was rabbit IgG (1 ug/1x10⁶) used under the same conditions. Unlabelled sample (Red line) was also used as a control.



IF (Immunofluorescence)

Figure 6. IF analysis of DTR/HBEGF using anti-DTR/HBEGF antibody (AAA19433). DTR/HBEGF was detected in a paraffin-embedded section of human colorectal adenocarcinoma tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 5 ug/mL rabbit anti-DTR/HBEGF Antibody (AAA19433) overnight at 4 degree C. DyLight550 Conjugated Goat Anti-Rabbit IgG (BA1135) was used as secondary antibody at 1:100 dilution and incubated for 30 minutes at 37 degree C. The section was counterstained with DAPI. Visualize using a fluorescence microscope and filter sets appropriate for the label used.



IHC (Immunohistochemistry)

Figure 5. IHC analysis of DTR/HBEGF using anti-DTR/HBEGF antibody (AAA19433). DTR/HBEGF was detected in a paraffin-embedded section of rat respiratory smooth muscle tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-DTR/HBEGF Antibody (AAA19433) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.



IHC (Immunohistochemistry)

Figure 4. IHC analysis of DTR/HBEGF using anti-DTR/HBEGF antibody (AAA19433). DTR/HBEGF was detected in a paraffin-embedded section of mouse lung tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-DTR/HBEGF Antibody (AAA19433) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.



IHC (Immunohistochemistry)

Figure 3. IHC analysis of DTR/HBEGF using anti-DTR/HBEGF antibody (AAA19433). DTR/HBEGF was detected in a paraffin-embedded section of human appendiceal adenocarcinoma tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-DTR/HBEGF Antibody (AAA19433) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.



IHC (Immunohistochemistry)

Figure 2. IHC analysis of DTR/HBEGF using anti-DTR/HBEGF antibody (AAA19433). DTR/HBEGF was detected in a paraffin-embedded section of human lung adenocarcinoma tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH 8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 ug/ml rabbit anti-DTR/HBEGF Antibody (AAA19433) overnight at 4 degree C. Peroxidase Conjugated Goat Anti-rabbit IgG was used as secondary antibody and incubated for 30 minutes at 37 degree C. The tissue section was developed using HRP Conjugated Rabbit IgG Super Vision Assay Kit with DAB as the chromogen.

ADDITIONAL INFORMATION

Related Product Information for anti-HBEGF antibody	Background: Chitinase-3-like protein 1, also called CHI3L1 or YKL-40 is a secreted glycoprotein that is approximately 40kDa in size that in humans is encoded by the CHI3L1 gene. This gene is mapped to 1q32.1. Chitinases catalyze the hydrolysis of chitin, which is an abundant glycopolymer found in insect exoskeletons and fungal cell walls. The glycoside hydrolase 18 family of chitinases includes eight human family members. This gene encodes a glycoprotein member of the glycosyl hydrolase 18 family. The protein lacks chitinase activity and is secreted by activated macrophages, chondrocytes, neutrophils and synovial cells. The protein is thought to play a role in the process of inflammation and tissue remodeling. Principle of the Assay: The Quick Picokine™ Mouse CHI3L1 Pre-Coated ELISA (Enzyme-Linked Immunosorbent Assay) kit is a solid phase immunoassay specially designed to measure Mouse CHI3L1 in cell culture supernatants, cell lysates, serum and plasma (heparin, EDTA). It uses our proprietary Quick ELISA technology. Quick ELISA technology employs capture antibodies conjugated to an affinity tag that is recognized by the polyclonal antibody used to coat our Quick ELISA plates. This approach to sandwich ELISA allows the formation of the antibody-analyte sandwich complex in a single step, significantly reducing assay time. The kit contains recombinant Mouse CHI3L1 with immunogen: Expression system for standard: NS0; Immunogen sequence: Y22-A381. To measure Mouse CHI3L1, add standards and samples to the wells, then add antibody cocktail. Wash the wells with PBS or TBS buffer, and add TMB. TMB is an HRP substrate and will be catalyzed to produce a blue color product, which changes into yellow after adding the acidic stop solution. The absorbance of the yellow product is linearly proportional to Mouse CHI3L1 in the sample. Read the absorbance of the yellow product in each well using a plate reader, and benchmark the sample wells' readings against the standard curve to determine the concentration of Mouse CHI3L1 in the sample.
Product Categories/Family for anti-HBEGF antibody	Primary Antibodies, Rabbit Polyclonal Antibodies

NCBI AND UNIPROT INFORMATION

NCBI GI #	4503413
NCBI GeneID	1839
NCBI Accession #	NP_001936.1
NCBI GenBank Nucleotide #	NM_001945.2
UniProt Accession #	Q99075; B2R821
Molecular Weight	23,067 Da
NCBI Official Full Name	proheparin-binding EGF-like growth factor
NCBI Official Synonym Full Names	heparin-binding EGF-like growth factor
NCBI Official Symbol	HBEGF
NCBI Official Synonym Symbols	DTR; DTS; DTSF; HEGFL
NCBI Protein Information	proheparin-binding EGF-like growth factor; heparin-binding epidermal growth factor; diphtheria toxin receptor (heparin-binding EGF-like growth factor); diphtheria toxin receptor (heparin-binding epidermal growth factor-like growth factor)
UniProt Protein Name	Proheparin-binding EGF-like growth factor
UniProt Gene Name	HBEGF
UniProt Synonym Gene Names	DTR; DTS; HEGFL; HB-EGF; HBEGF; DT-R
UniProt Entry Name	HBEGF_HUMAN

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.