

Product Datasheet

Cytokeratin 8 KRT8 Antibody (monoclonal, 3G9) (orb527059)

Catalog Number orb527059

Category Antibodies

Description Anti-Cytokeratin 8 KRT8 Antibody (monoclonal, 3G9). Tested in Flow Cytometry,

IF, IHC, IHC-F, ICC, WB applications. This antibody reacts with Human, Mouse,

Rat.

Clonality Monoclonal

Species/Host Mouse

Isotype Mouse IgG2b

Conjugation Unconjugated

Reactivity Human, Mouse, Rat

Form/Appearance Lyophilized

Concentration Adding 0.2 ml of distilled water will yield a concentration of 500 μg/ml.

Purification Immunogen affinity purified.

Immunogen E.coli-derived human Cytokeratin 8 recombinant protein (Position: D107-K325).

Human Cytokeratin 8 shares 95.4% and 94.5% amino acid (aa) sequence

identity with mouse and rat Cytokeratin 8, respectively.

UniProt ID P05787

MW 54 kDa

Tested applications FC, ICC, IF, IHC, IHC-Fr, WB

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Application notes Western blot, 0.1-0.5μg/ml Immunohistochemistry (Paraffin-embedded Section),

0.5-1µg/ml Immunohistochemistry (Frozen Section), 0.5-1µg/ml

Immunofluorescence, $2\mu g/ml$ Immunocytochemistry/Immunofluorescence, $2\mu g/ml$ Flow Cytometry (Fixed), $1-3\mu g/1x106$ cells. Add 0.2ml of distilled water

will yield a concentration of 500µg/ml

Cross Reactivity No cross-reactivity with other proteins.

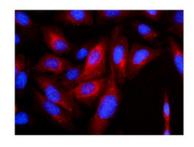
Antibody Type Primary Antibody

Clone Number 3G9

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.

Note For research use only



IF analysis of Cytokeratin 8 using anti-Cytokeratin 8 antibody. Cytokeratin 8 was detected in immunocytochemical section of U20S cell. Enzyme antigen retrieval was performed using IHC enzyme antigen retrieval reagent for 15 mins. The cells were blocked with 10% goat serum. And then incubated with 2 $\mu g/ml$ mouse anti-Cytokeratin 8 Antibody overnight at 4°C. Biotin Conjugated Goat anti-Mouse IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The section was developed using Cy3 Conjugated Avidin. Visualize using a fluorescence microscope and filter sets appropriate for the label used.

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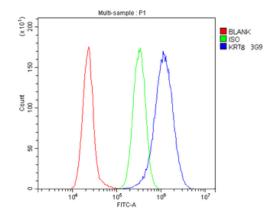
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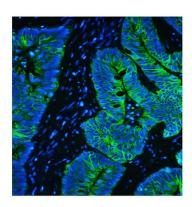
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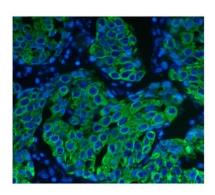




Flow Cytometry analysis of A549 cells using anti-Cytokeratin 8 antibody. Overlay histogram showing A549 cells (Blue line). To facilitate intracellular staining, cells were fixed with 4% paraformaldehyde and permeabilized with permeabilization buffer. The cells were blocked with 10% normal goat serum. And then incubated with rabbit anti-Cytokeratin 8 Antibody (1 $\mu g/1x10^6$ cells) for 30 min at 20°C. DyLight®488 conjugated goat anti-rabbit IgG (5-10 $\mu g/1x10^6$ cells) was used as secondary antibody for 30 minutes at 20°C. Isotype control antibody (Green line) was rabbit IgG (1 $\mu g/1x10^6$) used under the same conditions. Unlabelled sample (Red line) was also used as a control.



IF analysis of Cytokeratin 8 using anti-Cytokeratin 8 antibody. Cytokeratin 8 was detected in paraffin-embedded section of human intestinal cancer tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 µg/mL mouse anti-Cytokeratin 8 Antibody overnight at 4°C. DyLight®488 Conjugated Goat Anti-Mouse IgG was used as secondary antibody at 1:100 dilution and incubated for 30 minutes at 37°C. The section was counterstained with DAPI. Visualize using a fluorescence microscope and filter sets appropriate for the label used.



IF analysis of Cytokeratin 8 using anti-Cytokeratin 8 antibody. Cytokeratin 8 was detected in paraffin-embedded section of human mammary cancer tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 2 µg/mL mouse anti-Cytokeratin 8 Antibody overnight at 4°C. DyLight®488 Conjugated Goat Anti-Mouse IgG was used as secondary antibody at 1:100 dilution and incubated for 30 minutes at 37°C. The section was counterstained with DAPI. Visualize using a fluorescence microscope and filter sets appropriate for the

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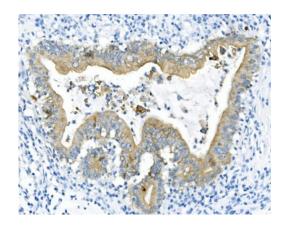
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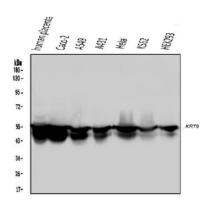
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IHC analysis of Cytokeratin 8 using anti-Cytokeratin 8 antibody. Cytokeratin 8 was detected in paraffin-embedded section of human rectal cancer tissue. Heat mediated antigen retrieval was performed in EDTA buffer (pH8.0, epitope retrieval solution). The tissue section was blocked with 10% goat serum. The tissue section was then incubated with 1 μ g/ml mouse anti-Cytokeratin 8 Antibody overnight at 4°C. Peroxidase Conjugated Goat Anti-Mouse IgG was used as secondary antibody and incubated for 30 minutes at 37°C. The tissue section was developed using HRP Conjugated Mouse IgG Super Vision Assay Kit with DAB as the chromogen.



Western blot analysis of Cytokeratin 8 using anti-Cytokeratin 8 antibody. Electrophoresis was performed on a 5-20% SDS-PAGE gel at 70V (Stacking gel) / 90V (Resolving gel) for 2-3 hours. The sample well of each lane was loaded with 50 ug of sample under reducing conditions. Lane 1: human placenta tissue lysates; Lane 2: human Caco-2 whole cell lysates; Lane 3: human A549 whole cell lysates; Lane 4: human A431 whole cell lysates; Lane 5: human Hela whole cell lysates; Lane 6: human K562 whole cell lysates; Lane 7: human HEK293 whole cell lysates. After Electrophoresis, proteins were transferred to a Nitrocellulose membrane at 150mA for 50-90 minutes. Blocked the membrane with 5% Non-fat Milk/ TBS for 1.5 hour at RT. The membrane was incubated with mouse anti-Cytokeratin 8 antigen affinity purified monoclonal antibody at 0.5 µg/mL overnight at 4°C, then washed with TBS-0.1% Tween 3 times with 5 minutes each and probed with a goat anti-mouse IgG-HRP secondary antibody at a dilution of 1:10000 for 1.5 hour at RT. The signal is developed using an Enhanced Chemiluminescent detection (ECL) kit with Tanon 5200 system. A specific band was detected for Cytokeratin 8 at approximately 54KD. The expected band size for Cytokeratin 8 is at 54KD.

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