

Product datasheet

anti-Keratin K5/K8 (Pan Epithelial) mouse monoclonal, C22, liquid, purified

Short overview

Cat. No.	690031
Quantity	1 ml (50 µg/ml)
Concentration	50 µg/ml (50 µg)

Product description

Host	Mouse
Antibody Type	Monoclonal
Isotype	IgG1
Clone	Ks 5+8.22/C22
Immunogen	Human keratin K8, purified from SDS PAGE gel
Formulation	Contains 0.09% sodium azide, 0.5% BSA in PBS buffer, pH 7.4
UniprotID	Q5XQN5 (Bovine), Q7RTS7 (Human), Q922U2 (Mouse), P05786 (Bovine), P05787 (Human), P11679 (Mouse)
Synonym	Keratin, type II cytoskeletal 74, Cytokeratin-74, CK-74, Keratin-5c, K5C, Keratin-74, K74, Type II inner root sheath-specific keratin-K6irs4, Type-II keratin Kb37, KRT74, K6IRS4, KB37, KRT5C, KRT6IRS4, Keratin, type II cytoskeletal 8, Cytokeratin-8, CK-8, Keratin-8, K8, Type-II keratin Kb8, KRT8, CYK8
Conjugate	Unconjugated
Purification	Affinity chromatography
Storage	Short term at 2-8°C; long term storage in aliquots at -20°C; avoid freeze/thaw cycles
Intended use	Research use only
Application	ICC/IF, IHC, WB
Reactivity	Bovine, Human, Mouse, Rat

Applications

Immunocytochemistry (ICC)	Assay dependent
Immunohistochemistry (IHC) - frozen	1:10-1:100 (0.5-5 µg/ml)
Immunohistochemistry (IHC) - paraffin	1:10-1:100 (0.5-5 µg/ml, protease treatment and/or microwave treatment recommended)
Western Blot (WB)	1:500 (0.1 µg/ml)

Background

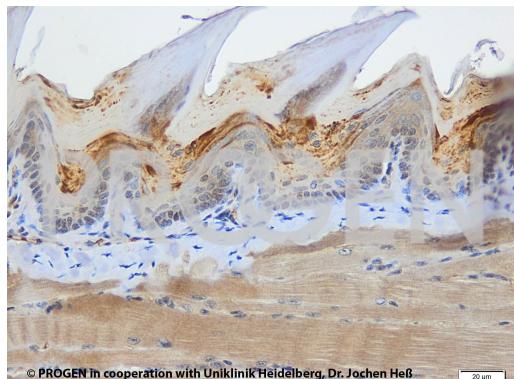
C22 represents an excellent marker for distinguishing carcinomas from all non-epithelial tumors. The antibody specifically reacts with keratins K5 and K8 present in nearly all epithelia.

Polypeptide reacting: Mr 52,500, Mr 58,000 keratins (type II keratins K5 and K8; formerly also designated cytokeratins 5 and 8) of human epithelial cells. Epitope has been mapped to aa 353-367 on alpha helical rod domain of Keratin K8 (Waseem et al., 2004).

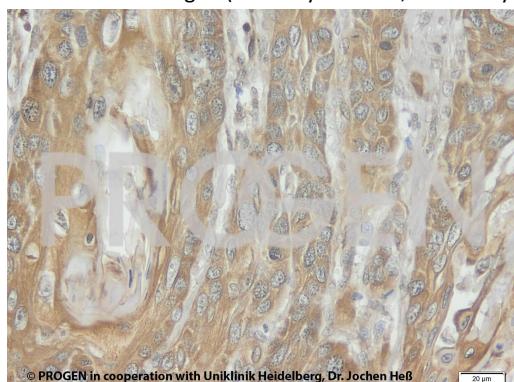
Reactivity on cultured cell lines: MCF-7, RT 112, HT-29, HaCaT, Detroit 562, RPMI 2650, SSC-12, bovine BMGE+H, BMGE-H, MDBK.

Waseem A, Karsten U, Leigh IM, Purkis P, Waseem NH, Lane BE: Conformational changes in the rod domain of human keratin 8 following heterotypic association with keratin 18 and its implication for filament stability. Biochemistry 43, 1283-1295 (2004).

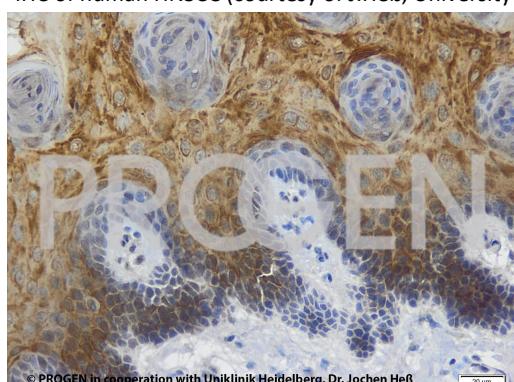
Product images



IHC of mouse tongue (courtesy of J.Heß, University Hospital Heidelberg)



IHC of human HNSCC (courtesy of J.Heß, University Hospital Heidelberg)



IHC of rat tongue (courtesy of J.Heß, University Hospital Heidelberg)

References

Publication	Species	Application
<u>Frese, L. et al. Optimizing large-scale autologous human keratinocyte sheets for major burnsâ€"Toward an animal-free production and a more accessible clinical application. Heal. Sci. Reports 5, 1â€“11 (2022).</u>	Human	IHC-P-IF
<u>Obermayr, E. et al. Circulating tumor cells: potential markers of minimal residual disease in ovarian cancer? a study of the OVCAD consortium. Oncotarget. 8, 106415-106428 (2017).</u>	human	ICC-IF
<u>Heid, H. et al. Lipid droplets, perilipins and cytokeratins--unravelled liaisons in epithelium-derived cells. PLoS One 8, (2013).</u>	human	ICC-IF