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# Cytokeratin 14 Polyclonal antibody

Catalog Number:10143-1-AP Featured Product 64 Publications

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## Basic Information

Catalog Number:
10143-1-AP

Size:
1000 μg/ml

Source:
Rabbit

Isotype:
IgG

Immunogen Catalog Number:
AG0188

GenBank Accession Number:
BC002690

GeneID (NCBI):
3861

UNIPROT ID:
P02533

Full Name:
keratin 14

Calculated MW:
472 aa, 52 kDa

Observed MW:
47-50 kDa

Purification Method:
Antigen affinity purification

Recommended Dilutions:
WB 1:500-1:2000
IP 0.5-4.0 ug for 1.0-3.0 mg of total protein lysate
IHC 1:20-1:200
IF 1:200-1:800

## Applications

Tested Applications:
FC, IF/ICC, IHC, IP, WB, ELISA

Cited Applications:
IF, IHC, WB

Species Specificity:
human, mouse, rat

Cited Species:
human, rat, mouse

***Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0***

Positive Controls:

WB : A431 cells, rat skin tissue

IP : A431 cells,

IHC : human lung cancer tissue, human cervical cancer tissue, human breast cancer tissue, human skin tissue, human skin cancer tissue, human oesophagus cancer tissue, mouse skin tissue

IF : HaCaT cells, HeLa cells, HepG2 cells, mouse olfactory epithelium tissue

## Background Information

Keratins are a large family of proteins that form the intermediate filament cytoskeleton of epithelial cells, which are classified into two major sequence types. Type I keratins are a group of acidic intermediate filament proteins, including K9-K23, and the hair keratins Ha1-Ha8. Type II keratins are the basic or neutral courterparts to the acidic type I keratins, including K1-K8, and the hair keratins, Hb1-Hb6. Keratin 14 is a type I cytokeratin. It is usually found as a heterotetramer with keratin 5. Keratins K14 and K5 have long been considered to be biochemical markers of the stratified squamous epithelia, including epidermis.

## Notable Publications

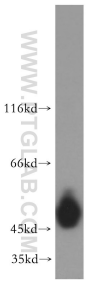
| Author | Pubmed ID | Journal | Application |
|---|---|---|---|
| Vlasta Lungova | 31551422 | Nat Commun | IF |
| Zichun Gu | 28975248 | JAMA Facial Plast Surg | IHC |
| Zhen-Huang Chen | 32918999 | Mol Cell Neurosci | IHC |

## Storage

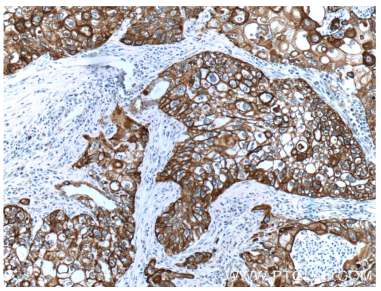
Storage:
Store at -20°C. Stable for one year after shipment.
Storage Buffer:
PBS with 0.02% sodium azide and 50% glycerol pH 7.3.
Aliquoting is unnecessary for -20°C storage

For technical support and original validation data for this product please contact:
T: 4006900926 E: Proteintech-CN@ptglab.com W: ptgcn.com

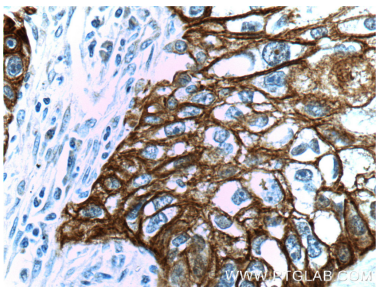
## Selected Validation Data



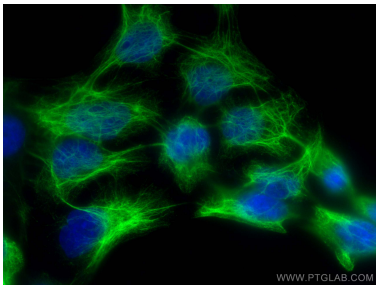

A431 cells were subjected to SDS PAGE followed by western blot with 10143-1-AP (Cytokeratin 14 antibody) at dilution of 1:1000 incubated at room temperature for 1.5 hours.



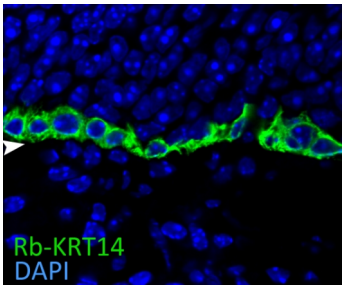
Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 10143-1-AP (Cytokeratin 14 antibody at dilution of 1:200 (under 10x lens).



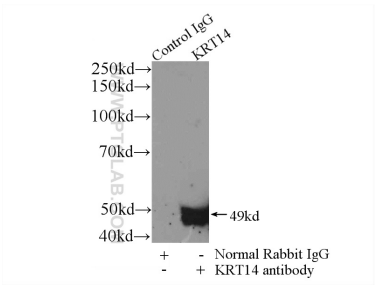
Immunohistochemical analysis of paraffin-embedded human lung cancer tissue slide using 10143-1-AP (Cytokeratin 14 antibody at dilution of 1:200 (under 40x lens).



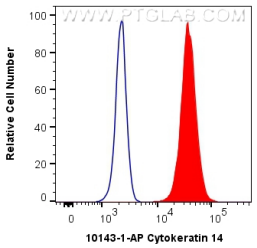
Immunofluorescent analysis of (-20°C Methanol) fixed HaCaT cells using Cytokeratin 14 antibody (10143-1-AP) at dilution of 1:400 and CoraLite®488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L).




IF result of CK14 (10143-1-AP, 1:400) with 1% PLP fixed basal quiescent stem cells of the adult mouse olfactory epithelium. (Green: CK14; Blue: DAPI). Basal lamina is marked by an arrow head. By Brian Lin, Tufts University.




IP result of anti-Cytokeratin 14 (IP:10143-1-AP, 3ug; Detection:10143-1-AP 1:1000) with A431 cells lysate 1200ug.




1X10^6 A431 cells were intracellularly stained with 0.4 ug Anti-Human Cytokeratin 14 (10143-1-AP) and CoraLite®488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) at dilution 1:1000 (red), or 0.4 ug Isotype Control. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).