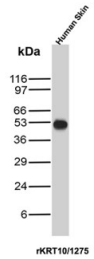
Keratin 10 Antibody rKRT10/1275 / Recombinant CK10 Monoclonal Antibody [clone rKRT10/1275] (V3602)

Catalog No.	Formulation	Size
V3602-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V3602-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V3602SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug
V3602IHC-7ML	Prediluted in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide; *For IHC use only*	7 ml

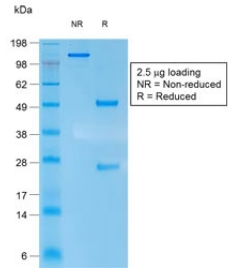
Recombinant MOUSE MONOCLONAL

Bulk quote request

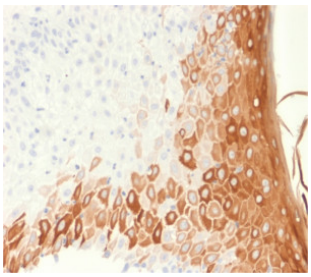
Species Reactivity	Human
Format	Purified
Host	Mouse
Clonality	Recombinant Mouse Monoclonal
Isotype	Mouse IgG1, kappa
Clone Name	rKRT10/1275
Purity	Protein G affinity chromatography
UniProt	P13645
Localization	Cytoplasmic
Applications	Immunohistochemistry (FFPE): 1-2ug/ml for 30 min at RT Western blot: 2-4ug/ml
Limitations	This Keratin 10 Antibody rKRT10/1275 is available for research use only.



Keratin 10 Antibody rKRT10/1275 by WB in Human Skin. Western blot analysis of human skin tissue lysate using Keratin 10 Antibody rKRT10/1275. A prominent immunoreactive band is detected at approximately 56-60 kDa, consistent with the expected molecular weight of cytokeratin 10 (56.5 kDa). The single sample lane shows a strong, relatively well-defined band with minimal additional immunoreactivity. The Recombinant CK10 Monoclonal Antibody demonstrates detection of endogenous KRT10 in human skin, where this intermediate filament protein is expressed predominantly in differentiated suprabasal keratinocytes. The observed migration is consistent with the predicted size of the target protein.



Keratin 10 Antibody rKRT10/1275 by SDS-PAGE. SDS-PAGE analysis of purified, BSA-free Keratin 10 Antibody rKRT10/1275 under non-reducing (NR) and reducing (R) conditions, with 2.5 ug of antibody loaded per lane. The non-reducing lane shows a prominent band near 150 kDa, consistent with intact IgG. Under reducing conditions, distinct bands are observed at approximately 50 kDa and 25 kDa, corresponding to the immunoglobulin heavy and light chains, respectively. The Recombinant CK10 Monoclonal Antibody demonstrates the expected electrophoretic profile of a purified mouse monoclonal antibody preparation.



Keratin 10 Antibody rKRT10/1275 by IHC in Human Skin. Immunohistochemistry of FFPE human skin tissue using Keratin 10 Antibody rKRT10/1275. Strong brown cytoplasmic staining is observed in differentiated suprabasal keratinocytes, while the basal epidermal layer exhibits comparatively weak staining. The Recombinant CK10 Monoclonal Antibody highlights the expected distribution of KRT10 in stratified squamous epithelium. Nuclei are counterstained blue with hematoxylin. Heat-induced epitope retrieval was performed using 10 mM citrate buffer, pH 6, for 10-20 minutes, followed by cooling at room temperature for 20 minutes.

Description

Keratin 10 Antibody rKRT10/1275 recognizes cytokeratin 10 (KRT10), a type I intermediate filament protein that plays an important role in the structural organization and differentiation of stratified squamous epithelia. Encoded by the KRT10 gene on chromosome 17, this protein is predominantly expressed in suprabasal keratinocytes of the epidermis. Its expression begins as keratinocytes exit the proliferative basal compartment and undergo terminal differentiation. This characteristic distribution makes keratin 10 an established marker of epidermal maturation and a useful indicator of normal keratinocyte differentiation.

Keratin 10 forms intermediate filament networks with keratin 1, its principal type II keratin partner. These filament structures contribute to the mechanical stability of differentiating epidermal cells and help maintain tissue integrity during the formation of the skin barrier. In normal epidermis, basal keratinocytes predominantly express keratins 5 and 14, whereas suprabasal cells increasingly express keratins 1 and 10. This coordinated change in keratin expression reflects the transition from proliferative to differentiated epithelial states. Researchers frequently examine KRT10 alongside involucrin, loricrin, and filaggrin to characterize epidermal development, stratification, and barrier formation.

Alterations in KRT10 expression are associated with inflammatory skin disorders, inherited keratin diseases, and epithelial neoplasia. In psoriasis, normal patterns of keratinocyte differentiation are disrupted, often resulting in reduced or altered keratin 10 expression within affected epidermis. Pathogenic variants in KRT10 are associated with epidermolytic ichthyosis, an inherited disorder characterized by epidermal fragility, blistering, and hyperkeratosis. Keratin 10 is also studied in squamous cell carcinomas, where its expression may reflect the degree of tumor cell differentiation. These biological associations make CK10 relevant to investigations of skin pathology, tissue remodeling, and epithelial tumor biology.

NSJ Bioreagents offers recombinant monoclonal clone rKRT10/1275 for investigating keratin 10 expression in epithelial tissues. Recombinant antibody production provides a defined antibody sequence and supports consistency between manufacturing batches. The Recombinant CK10 Monoclonal Antibody is suitable for studies examining keratinocyte maturation and changes in epidermal protein expression. A Keratin 10 Antibody such as rKRT10/1275 provides a useful reagent for research into epidermal differentiation, keratin-associated disorders, and epithelial tissue organization.

Explore our Cytokeratin 10 Antibody KRT10/7804R, supported by Western blot and human skin immunohistochemistry data, for investigating epidermal differentiation and KRT10 expression.

Application Notes

Optimal dilution of the Keratin 10 Antibody rKRT10/1275 should be determined by the researcher.

1. The prediluted format is supplied in a dropper bottle and is optimized for use in IHC. After epitope retrieval step (if required), drip mAb solution onto the tissue section and incubate at RT for 30 min.

Immunogen

Recombinant human Cytokeratin 10 protein was used as the immunogen for the recombinant Keratin 10 antibody.

Storage

Store the Keratin 10 Antibody rKRT10/1275 at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).

Alternate Names

Cytokeratin 10 antibody, CK10 antibody, KRT10 antibody, Cytokeratin-10 antibody, Type I Cytoskeletal Keratin 10 antibody, Keratin-10 antibody

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