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# Anti-Caspase 14 p10 Antibody

Catalog # AP51963

## Product Information

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|---|---|
| **Application** | WB |
| **Primary Accession** | P31944 |
| **Reactivity** | Human, Mouse, Rat |
| **Host** | Rabbit |
| **Clonality** | Polyclonal |
| **Calculated MW** | 27680 |

## Additional Information

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| **Gene ID** | 23581 |
| **Other Names** | Caspase-14; CASP-14 |
| **Target/Specificity** | KLH-conjugated synthetic peptide encompassing a sequence within the center region of human Caspase 14. The exact sequence is proprietary. |
| **Dilution** | WB~~WB (1/500 - 1/1000) |
| **Format** | Liquid in 0.42% Potassium phosphate, 0.87% Sodium chloride, pH 7.3, 30% glycerol, and 0.01% sodium azide. |
| **Storage** | Store at -20 °C.Stable for 12 months from date of receipt |

## Protein Information

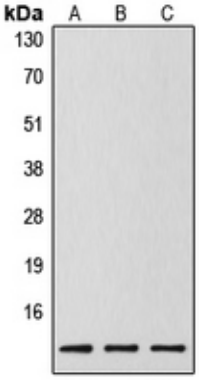
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|---|---|
| **Name** | CASP14 |
| **Function** | Non-apoptotic caspase involved in epidermal differentiation. Is the predominant caspase in epidermal stratum corneum (PubMed:15556625). Seems to play a role in keratinocyte differentiation and is required for cornification. Regulates maturation of the epidermis by proteolytically processing filaggrin (By similarity). In vitro has a preference for the substrate [WY]-X-X-D motif and is active on the synthetic caspase substrate WEHD-ACF (PubMed:16854378, PubMed:19960512). Involved in processing of prosaposin in the epidermis (By similarity). May be involved in retinal pigment epithelium cell barrier function (PubMed:25121097). Involved in DNA degradation in differentiated keratinocytes probably by cleaving DFFA/ICAD leading to liberation of DFFB/CAD (PubMed:24743736). |
| **Cellular Location** | Cytoplasm. Nucleus |
| **Tissue Location** | Expressed in keratinocytes of adult skin suprabasal layers (from spinous layers to the stratum granulosum and stratum corneum) (at protein level). |

Expressed in keratinocytes of hair shaft and sebaceous glands (at protein level). In psoriatic skin only expressed at very low levels (PubMed:11175259). The p17/10 mature form is expressed in epidermis stratum corneum, the p20/p8 intermediate form in epidermis upper granular cells of the stratum granulosum (PubMed:22825846).

## References


Eckhart L.,et al.Biochem. Biophys. Res. Commun. 277:655-659(2000).
Pistritto G.,et al.Cell Death Differ. 9:995-1006(2002).
Rasmussen H.H.,et al.Electrophoresis 13:960-969(1992).
Lippens S.,et al.Cell Death Differ. 7:1218-1224(2000).
Chien A.J.,et al.Biochem. Biophys. Res. Commun. 296:911-917(2002).


## Images




Western blot analysis of Caspase 14 p10 expression in MCF7 (A), mouse spleen (B), rat liver (C) whole cell lysates. (Predicted band size: 27 kD; Observed band size: 10 kD)


Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.