

**KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody**  
**Rabbit monoclonal antibody**  
**Catalog # AGI1508****Specification****KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody - Product Information**

Application	WB, FC
Primary Accession	<a href="#">Q14126</a>
Reactivity	Human
Clonality	Monoclonal
Isotype	Rabbit IgG
Calculated MW	Predicted, 122 kDa , observed, 160 kDa
Gene Name	DSG2
Aliases	DSG2; Desmoglein 2; CDHF5; Cadherin Family Member 5; Desmoglein-2; HDGC
Immunogen	A synthesized peptide derived from human Desmoglein 2

**KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody - Additional Information**

Gene ID	1829
<b>Other Names</b>	
Desmoglein-2, Cadherin family member 5, HDGC, DSG2, CDHF5	

**KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody - Protein Information****Name** DSG2**Synonyms** CDHF5**Function**

A component of desmosome cell-cell junctions which are required for positive regulation of cellular adhesion (PubMed: [38395410](http://www.uniprot.org/citations/38395410)). Involved in the interaction of plaque proteins and intermediate filaments mediating cell-cell adhesion. Required for proliferation and viability of embryonic stem cells in the blastocyst, thereby crucial for progression of post-implantation embryonic development (By similarity). Maintains pluripotency by regulating epithelial to mesenchymal transition/mesenchymal to epithelial transition (EMT/MET) via interacting with and sequestering CTNNB1 to sites of cell-cell contact, thereby reducing translocation of CTNNB1 to the nucleus and subsequent transcription of CTNNB1/TCF-target genes (PubMed: [29910125](http://www.uniprot.org/citations/29910125)). Promotes pluripotency and the multi-lineage differentiation potential of hematopoietic stem cells (PubMed: [27338829](http://www.uniprot.org/citations/27338829)). Plays a role in endothelial cell sprouting and elongation via mediating the junctional-association of cortical actin fibers and CDH5 (PubMed: [27338829](http://www.uniprot.org/citations/27338829)). Plays a role in limiting inflammatory infiltration and the apoptotic response to injury in kidney tubular epithelial cells, potentially via its role in maintaining

cell-cell adhesion and the epithelial barrier (PubMed:<a href="http://www.uniprot.org/citations/38395410" target="\_blank">38395410</a>).

### Cellular Location

Cell membrane; Single-pass type I membrane protein. Cell junction, desmosome. Cytoplasm

### Tissue Location

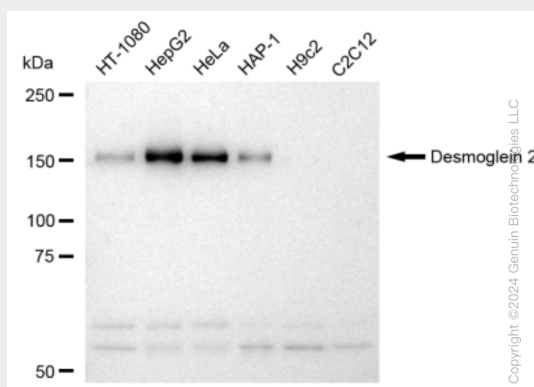
Expressed in undifferentiated pluripotent stem cells, expression decreases during differentiation (at protein level) (PubMed:29910125). Expressed in hematopoietic stem cells and circulating endothelial progenitor cells, expression decreases upon increasing cell lineage commitment (at protein level) (PubMed:27338829). Expressed on common myeloid progenitors, pro- myelocytes, pro-erythrocytes and B-cell lineage progenitors (at protein level). Expression in mature cell types in the bone marrow and mature leukocyte populations is absent (PubMed:27338829). Expressed by foreskin fibroblasts, expression peaks during the early stage of differentiation reprogramming (at protein level) (PubMed:29910125) Expressed by endothelial cells in both arterioles and venules in the cervix (at protein level) (PubMed:27338829). Expressed in kidney tubular epithelial cells (PubMed:38395410)

## KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody - Protocols

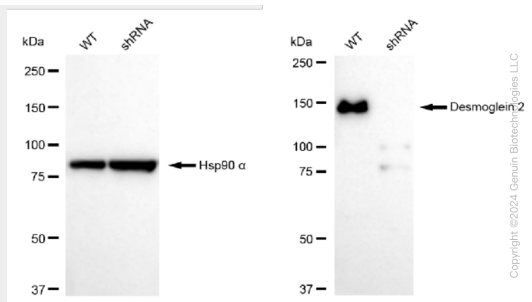
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

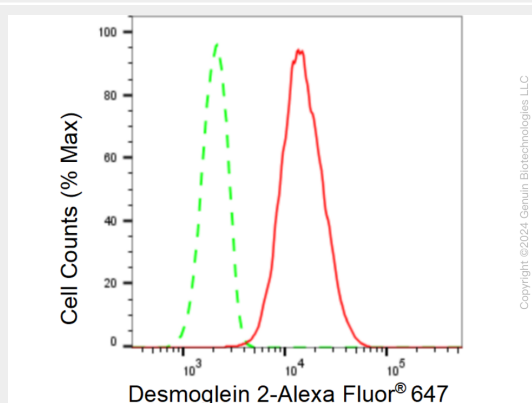
## KD-Validated Anti-Desmoglein 2 Rabbit Monoclonal Antibody - Images



Western blotting analysis using anti-Desmoglein 2 antibody (Cat#AGI1508). Total cell lysates (30 µg) from various cell lines were loaded and separated by SDS-PAGE. The blot was incubated with anti-Desmoglein 2 antibody (Cat#AGI1508, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Western blotting analysis using anti-Desmoglein 2 antibody (Cat#AGI1508). Desmoglein 2 expression in wild type (WT) and Desmoglein 2 shRNA knockdown (KD) HeLa cells with 30 µg of total cell lysates. Hsp90 α serves as a loading control. The blot was incubated with anti-Desmoglein 2 antibody (Cat#AGI1508, 1:5,000) and HRP-conjugated goat anti-rabbit secondary antibody respectively.



Flow cytometric analysis of Desmoglein 2 expression in HepG2 cells using Desmoglein 2 antibody (Cat#AGI1508, 1:2,000). Green, isotype control; red, Desmoglein 2.