

# Product datasheet

# DOWN SYNDROME CELL ADHESION MOLECULE (DSCAM) ANTIBODY (DS2-176)

SKU: MM-0114-P

100 µg

| OVERVIEW                      |  |
|-------------------------------|--|
| Clonality:<br>Monoclonal      |  |
| Host:<br>Mouse                |  |
| Reactivity:<br>Chicken, Mouse |  |
| Application:<br>IHC, WB       |  |
| Target:<br>Dscam              |  |

# Target background:

Down syndrome cell adhesion molecule (Dscam) is a cell adhesion molecule that plays a role in neuronal self-avoidance. It promotes repulsion between specific neuronal processes of either the same cell or the same subtype of cells. Dscam mediates, within retinal amacrine and ganglion cell subtypes, both isoneuronal self-avoidance for creating an orderly dendritic arborization and heteroneuronal self-avoidance to maintain the mosaic spacing between amacrine and ganglion cell bodies. It is the receptor for netrin that is required for axon guidance independently of and in collaboration with the receptor DCC. In spinal cord development, it plays a role in guiding commissural axons during projection and pathfinding across the ventral midline to reach the floor plate upon ligand binding. Dscam enhances netrin-induced phosphorylation of PAK1 and FYN. It mediates intracellular signaling by stimulating the activation of MAPK8 and MAP kinase p38. Dscam interacts with DCC, Netrin-1, PAK1 and RAC1.

# Specificity:

A specific antibody against the chicken Dscam C-terminal region (amino acids 1207 to 1527) .

#### Clone ID:

DS2-176

# Isotype:

IgG1 kappa

# Preservative:

None

#### Format:

Lyophilized protein G purified in PBS pH7.4

# Recommend starting dilution:

If reconstituted with deionized water in 100  $\mu$ L: IHC 1:250 to 1:500. Optimal dilution has to be determined by the user.

#### Limitations:

Research Use Only

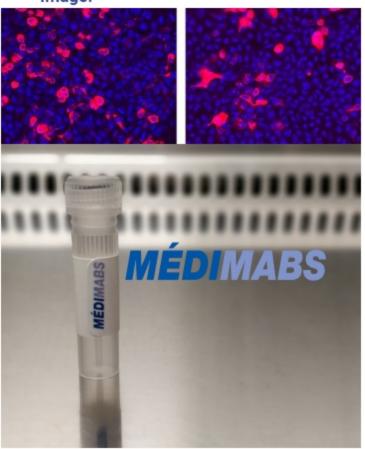
#### References:

1.-Yamagata M and Sanes JR - Dscam and Sidekick proteins direct lamina-specific synaptic connections in vertebrate retina.

# Storage:

Lyophilized antibodies can be kept at 4°C for up to 3 months and should be kept at -20°C for long-term storage (2 years). To avoid freeze-thaw cycles, reconstituted antibodies should be aliquoted before freezing for long-term (1 year) storage (-80°C) or kept at 4°C for short-term usage (2 months). For maximum recovery of product, centrifuge the original vial prior to removing the cap. Further dilutions can be made with the assay buffer. After the maximum long-term storage period (2 years lyophilized or 1 year reconstituted) antibodies should be tested in your assay with a standard sample to verify if you have noticed any decrease in their efficacy.

# Image:



Transfected human embryonic kidney 293 cells, overexpressing chicken Dscam or mouse Dscam, fixed with 4% paraformaldehyde/PBS. Cells are labeled with anti-Dscam (DS2-176) antibody