

## **Product datasheet for BM5017**

## OriGene Technologies, Inc.

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## Desmoplakin (DSP) Mouse Monoclonal Antibody [Clone ID: DP-2.17]

**Product data:** 

**Product Type:** Primary Antibodies

Clone Name: DP-2.17
Applications: IHC, WB

Recommended Dilution: Immunoblotting (Western blot).

Immunohistochemistry on Frozen Sections.

Immunohistochemistry on Paraffin Embedded Sections (After Microwave treatment).

Working Dilution: Dilute 1/10 with PBS (pH 7.4) immediately befor use for

Immunohistochemistry. *Incubation Time:* 1h at RT.

**Reactivity:** Bovine, Chicken, Human, Mouse, Rat

Host: Mouse Isotype: IgG1

Clonality: Monoclonal

**Immunogen:** Bovine Desmoplakin 1

**Specificity:** DP 2.17 shows distinct punctate membrane staining of epithelia.

It reacts with the rod fragment of Desmoplakin 1 (Mr 250,000 polypeptide of desmosomal

plaques).

**Tested Reactivities on Cultured Cell Lines:** 

Several Human carcinoma cell lines: MCF-7, A-431, TR-146.

Bovine cells: MDBK, BMGE.

**Formulation:** PBS, pH 7.4 containing 0.09% Sodium Azide and 0.5% BSA

State: Purified

State: Lyophilized purified Ig fraction

**Reconstitution Method:** Restore with 1 ml distilled water.

**Purification:** Affinity Chromatography on Protein A

Conjugation: Unconjugated





## Desmoplakin (DSP) Mouse Monoclonal Antibody [Clone ID: DP-2.17] - BM5017

**Storage:** Store lyophilized at 2-8°C for 6 months or at -20°C long term.

After reconstitution store the antibody undiluted at 2-8°C for one month

or (in aliquots) at -20°C long term. Avoid repeated freezing and thawing.

**Stability:** Shelf life: one year from despatch.

Gene Name: desmoplakin

Database Link: Entrez Gene 306871 RatEntrez Gene 1832 Human

P15924

**Background:** Desmosomes are intercellular junctions that form tight links between adjacent cells.

Desmoplakin is an obligate component of functional desmosomes that attaches intermediate filaments to desmosomal plaques. It is involved in the organization of desmosomal cadherin-

plakoglobin complexes into discrete plasma membrane domains. The N-terminus of

desmoplakin is essential for localisation to the desmosome and interaction with plakophilin 1 and plakoglobin. The C-terminus of desmoplakin binds to intermediate filaments. The central region of desmoplakin comprises a coiled-coil rod domain that mediates homodimerisation. There are two isoforms of desmoplakin - desmoplakin I, which is an obligate component of all desmosomes, and desmoplakin II, which is predominantly expressed in tissues and cells of

stratified origin. Mutations in the gene encoding desmoplakin result in a number of cardiomyopathies and keratodermas as well as the autoimmune disease paraneoplastic

pemphigus.

**Synonyms:** DP, DSP, 250/210 kDa paraneoplastic pemphigus antigen

**Protein Families:** Druggable Genome

**Protein Pathways:** Arrhythmogenic right ventricular cardiomyopathy (ARVC)