

gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide Mouse Monoclonal Antibody [Clone SPM286 ] Catalog # AH10738

### Specification

## gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - Product Information

Application Primary Accession Other Accession Reactivity Host Clonality Isotype Calculated MW IHC-P, IF, FC <u>P40967</u> <u>6490, 95972</u> Human, Horse Mouse Monoclonal Mouse / IgG2b, kappa 90-100kDa KDa

## gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - Additional Information

Gene ID 6490

#### **Other Names**

Melanocyte protein PMEL, ME20-M, ME20M, Melanocyte protein Pmel 17, Melanocytes lineage-specific antigen GP100, Melanoma-associated ME20 antigen, P1, P100, Premelanosome protein, Silver locus protein homolog, M-alpha, 95 kDa melanocyte-specific secreted glycoprotein, P26, Secreted melanoma-associated ME20 antigen, ME20-S, ME20S, M-beta, PMEL, D12S53E, PMEL17, SILV

#### **Application Note**

<span class ="dilution\_IHC-P">IHC-P~~N/A</span><br \><span class ="dilution\_IF">IF~~1:50~200</span><br \><span class ="dilution\_FC">FC~~1:10~50</span>

Format

200ug/ml of Ab purified from Bioreactor Concentrate by Protein A/G. Prepared in 10mM PBS with 0.05% BSA & 0.05% azide. Also available WITHOUT BSA & azide at 1.0mg/ml.

Storage

Store at 2 to 8°C.Antibody is stable for 24 months.

#### **Precautions**

gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide is for research use only and not for use in diagnostic or therapeutic procedures.

## gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - Protein Information

Name PMEL



Synonyms D12S53E, PMEL17, SILV

### Function

Forms physiological amyloids that play a central role in melanosome morphogenesis and pigmentation. The maturation of unpigmented premelanosomes from stage I to II is marked by assembly of processed amyloidogenic fragments into parallel fibrillar sheets, which elongate the vesicle into a striated ellipsoidal shape. In pigmented stage III and IV melanosomes, the amyloid matrix serves as a platform where eumelanin precursors accumulate at high local concentrations for pigment formation. May prevent pigmentation-associated toxicity by sequestering toxic reaction intermediates of eumelanin biosynthesis pathway.

### **Cellular Location**

Endoplasmic reticulum membrane; Single-pass type I membrane protein. Golgi apparatus, cis-Golgi network membrane; Single-pass type I membrane protein. Endosome, multivesicular body. Melanosome Extracellular vesicle. Secreted. Note=Identified by mass spectrometry in melanosome fractions from stage I to stage IV (PubMed:17081065) Localizes predominantly to intralumenal vesicles (ILVs) within multivesicular bodies. Associates with ILVs found within the lumen of premelanosomes and melanosomes and particularly in compartments that serve as precursors to the striated stage II premelanosomes (PubMed:11694580, PubMed:12643545). Sorted to stage I melanosomes following its processing in the ER and cis-Golgi (PubMed:15096515) Transiently expressed at the cell surface before targeting to early melanosomes (PubMed:16760433, PubMed:30988362). Colocalizes with BACE2 in stage I and II melanosomes (PubMed:23754390). Colocalizes with CD63 and APOE at exosomes and in intraluminal vesicles within multivesicular endosomes (PubMed:26387950)

#### **Tissue Location**

Normally expressed at low levels in quiescent adult melanocytes but overexpressed by proliferating neonatal melanocytes and during tumor growth. Overexpressed in melanomas. Some expression was found in dysplastic nevi.

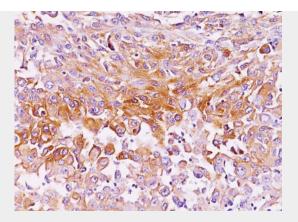
## gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide -Images





Formalin-fixed, paraffin-embedded human Melanoma stained with gp100 Monoclonal Antibody (SPM286).

# gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - Background

By immunohistochemistry, it specifically recognizes a protein in melanocytes and melanomas. This MAb reacts with junctional and blue nevus cells and variably with fetal and neonatal melanocytes. Intradermal nevi, normal adult melanocytes, and non-melanocytic cells are negative. It does not stain tumor cells of epithelial, lymphoid, glial, or mesenchymal origin. This Mab labels formalin-fixed, paraffin-embedded melanomas and other tumors showing melanocytic differentiation.

# gp100 / Melanosome / PMEL17 / SILV (Melanoma Marker) Antibody - With BSA and Azide - References

Vennegoor C. et al., Am.J. Pathol. 130: 179-192, 1988