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Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17)

Recombinant Antibody
Catalog # APR11015

Specification

Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) - Product Information

Application	**FC, Kinetics, Animal Model**
Primary Accession	P40967
Reactivity	**Rat, Human, Mouse**
Clonality	**Monoclonal**
Isotype	**IgG1**
Calculated MW	**145.38 KDa**

Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) - Additional Information

Target/Specificity
PMEL

Endotoxin
< 0.001EU/ μg,determined by LAL method.

Conjugation
Unconjugated

Expression system
CHO Cell

Format
Purified monoclonal antibody supplied in PBS, pH6.0, without preservative.This antibody is purified through a protein A column.

Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) - 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:21962903, PubMed:26387950)

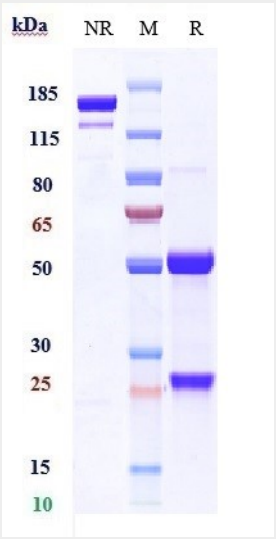
Tissue Location
Normally expressed at low levels in quiescent adult melanocytes but overexpressed by proliferating neonatal melanocytes and during tumor growth. Overexpressed in melanomas. Some expression was found in dysplastic nevi.

Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) - Images



Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17) on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 95%

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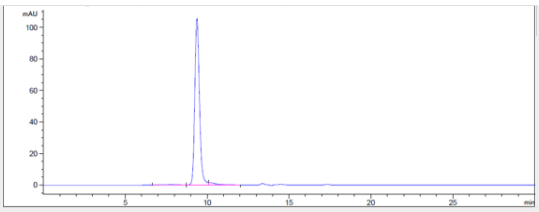

The purity of Anti-PMEL Reference Antibody (Novartis patent anti-PMEL17)is more than 96.2% ,determined by SEC-HPLC.