Datasheet for ABIN5596817

anti-beta-2 Microglobulin antibody (HRP)

3 Images

Go to Product page

Overview

Quantity:	100 µg
Target:	beta-2 Microglobulin (B2M)
Reactivity:	Human
Host:	Rabbit
Clonality:	Polyclonal
Conjugate:	This beta-2 Microglobulin antibody is conjugated to HRP
Application:	Western Blotting (WB), ELISA, Immunohistochemistry (IHC), Fluorescence Microscopy (FM)

Product Details

Purpose:	Beta-2-Microglobulin Antibody Peroxidase Conjugated
Immunogen:	Immunogen: Anti-Beta-2-Microglobulin Antibody was produced by repeated immunizations with beta-2-Microglobulin protein isolated from human urine. Immunogen Type: Native Protein
Isotype:	IgG
Cross-Reactivity (Details):	Assay by immunoelectrophoresis resulted in a single precipitin arc against anti-Peroxidase and anti-Rabbit Serum, as well as purified and partially purified b2-Microglobulin (Human Urine).
Characteristics:	Synonyms: rabbit anti-Beta-2-Microglobulin Antibody Peroxidase Conjugation, HRP conjugated Beta-2-Microglobulin Antibody, B2M antibody, Beta 2 microglobulin precursor antibody, Beta chain of mhc class 1 proteins antibody, Hdcma22p antibody
Purification:	Anti-beta-2-Microglobulin antibody is an IgG fraction antibody purified from monospecific antiserum by a multi-step process which includes delipidation, salt fractionation and ion

Product Details

	exchange chromatography followed by extensive dialysis against the buffer stated above.

Target Details

Target:	beta-2 Microglobulin (B2M)
Alternative Name:	B2M (B2M Products)
Background:	Background: Anti-beta-2-Microglobulin Antibody detects beta-2-Microglobulin. Beta-2-microglobulin is a component of the class I major histocompatibility complex (MHC), which are present on all nucleated cells (excludes red blood cells). It is involved in the presentation of peptide antigens to the immune system. Beta-2-microglobulin associates not only with the alpha chain of MHC class I molecules, but also with class I-like molecules such as CD1 and Qa. Defects in B2M are the cause of hypercatabolic hypoproteinemia. Anti-beta-2-Microglobulin Antibody is ideal for investigators involved in Cell Signaling, Immunology and Cell Biology research.
Gene ID:	567
NCBI Accession:	NP_004039
UniProt:	P61769
Pathways:	TCR Signaling, Regulation of Leukocyte Mediated Immunity, Positive Regulation of Immune Effector Process

Application Details

Application Notes:	Immunohistochemistry Dilution: 1:200 - 1:1,000 Application Note: Anti-beta-2-Microglobulin Peroxidase antibody has been tested in ELISA and western blotting, and is suitable for IF and IHC. Researchers should determine optimal titers for applications that are not stated below. Western Blot Dilution: 1:500 - 1:2,000 ELISA Dilution: 1:2,000 - 1:10,000 IF Microscopy Dilution: 1:200 Other: User Optimized
Restrictions:	For Research Use only

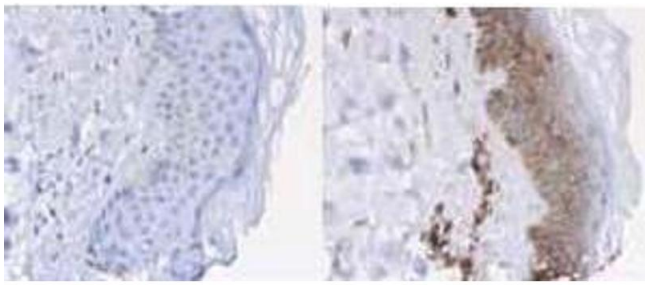
Handling

Format:	Lyophilized

Handling

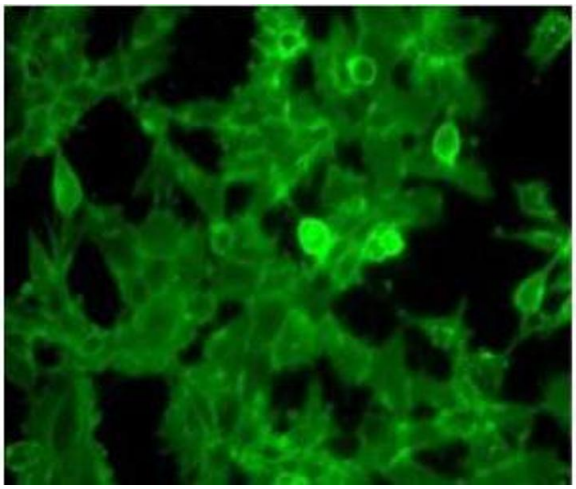
Reconstitution:	Reconstitution Volume: 100 µL Reconstitution Buffer: Restore with deionized water (or equivalent)
Concentration:	1.0 mg/mL
Buffer:	Buffer: 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2 Stabilizer: 10 mg/mL Bovine Serum Albumin (BSA) - Immunoglobulin and Protease free Preservative: 0.01 % (w/v) Gentamicin Sulfate. Do NOT add Sodium Azide!
Preservative:	Gentamicin sulfate
Precaution of Use:	This product contains Gentamicin sulfate: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.
Storage:	4 °C,-20 °C
Storage Comment:	Store vial at 4° C prior to restoration. For extended storage aliquot contents and freeze at -20° C or below. Avoid cycles of freezing and thawing. Centrifuge product if not completely clear after standing at room temperature. This product is stable for several weeks at 4° C as an undiluted liquid. Dilute only prior to immediate use.
Expiry Date:	12 months

Images



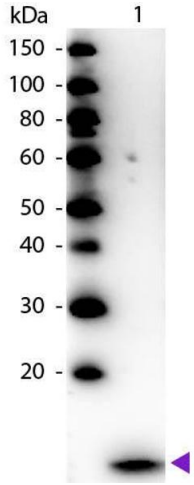
Immunohistochemistry

Image 1. Immunohistochemistry of Rabbit anti-Beta-2-Microglobulin Antibody. Tissue: normal human skin. Fixation: formalin fixed paraffin embedded. Antigen retrieval: not required. Primary antibody: Left panel: isotype control, Right panel: ß2 microglobulin antibody at 1 ug/ml for 20 min at RT. Secondary antibody: Peroxidase rabbit secondary antibody at 1:10,000 for 45 min at RT. Localization: ß2 microglobulin is cell membrane (and to lesser amount cytoplasmatic compartment). Staining: Beta-2-Microglobulin as brown with diaminobenzidine and with a hematoxylin purple counterstain.



Immunofluorescence

Image 2. Immunofluorescence Microscopy of Rabbit Anti-Beta-2-microglobulin antibody. Tissue: Human Embryonic Kidney cells (HEK 293 cells). Fixation: 2% paraformaldehyde for 15 minutes. Antigen retrieval: not required. Primary antibody: ß-2 microglobulin antibody at 1:200 for overnight at 4°C. Secondary antibody: donkey anti-rabbit secondary antibody conjugated with Alexa Fluor 488 fluorochrome at 1:1,000 for 45 min at RT. Localization: ß2-microglobulin is mainly on the cell surface and occasionally cytoplasmic. Staining: Beta-2-microglobulin as green fluorescent signal.



Western Blotting

Image 3. Western Blot of Peroxidase conjugated Rabbit Anti-Beta-2-Microglobulin primary antibody. Lane 1: Beta-2-Microglobulin. Lane 2: None. Load: 50 ng per lane. Primary antibody: None. Secondary antibody: Peroxidase rabbit secondary antibody at 1:1,000 for 60 min at RT. Blocking: ABIN925618 for 30 min at RT. Predicted/Observed size: 12 kDa, 12 kDa for Beta-2-Microglobulin. Other band(s): None.