Aeonian Biotech
Your choice for selective antibodies

Cat nr AE00113 **Product Datasheet**

Recombinant Mouse Antibody, clone rCTNNB1/2173 to:

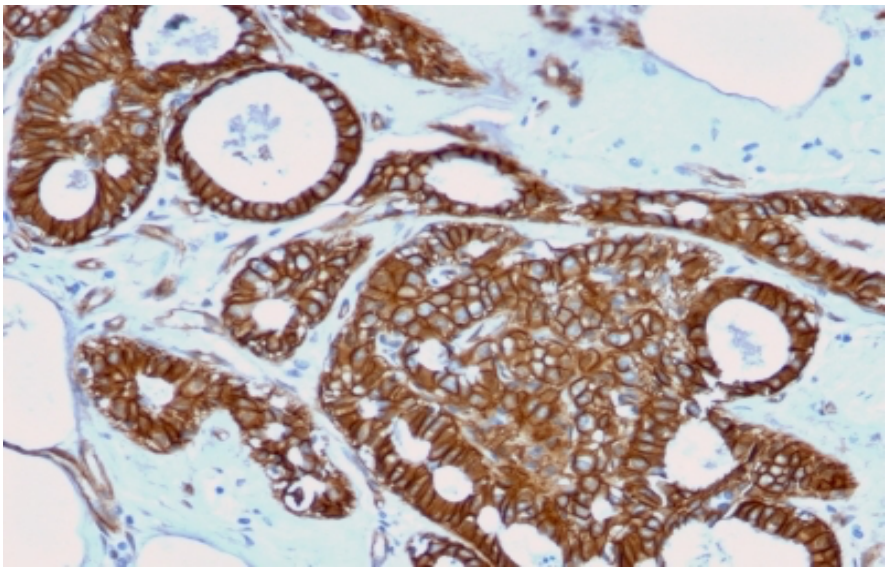
CTNNB1, Catenin beta

Armadillo; b-Catenin; Beta-catenin; Catenin beta 1; Catenin beta-1; CTNNB; EVR7; MRD19; OK/SW-cl.35; PRO2286

Cellular localization	Nucleus, plasma membrane, cell surface, cellular junctions
Official Symbol (Gene)	CTNNB1
GeneID	1499
SwissProt	P35222
Confirmed Applications	IHC, ICC, PA, WB
Positive controls	HeLa, MCF7, breast carcinoma.
Aeonian Rating©	90
Purification	By Protein G from bioreactor concentrate
Formulation	☐ 200ug IgG/ml in PBS, 0.05% BSA, 0.05% azide (20ug or 100ug) ☐ 1mg IgG/ml in PBS (100ug or contact us for quotation)
Amount	☐ 20ug ☐ 100ug
Isotype	Mouse IgG1, kappa
Confirmed species reactivity	Human
Immunogen	Recombinant full-length human beta-Catenin protein
Epitope	Unknown
Storage instructions	Avoid repeated freeze/thaw cycles. For long term storage, keep small aliquots at -20C or -80C and keep one aliquot at 4C for daily experimentations. Azide will preserve antibody at 4C for 6-12 months, when kept away from direct sun light.
Expiration	Integrity warranted for 24 months after purchase when handled and stored according to instructions, see below.
Warranty	This product is only warranted for the specifications as described in this product sheet and only when the product is handled and stored according to instructions. User should validate this antibody in the application and tissue/cell type as required, after confirmation of integrity upon receipt is obtained by reproducing the performance as described below. Should such confirmation not be attempted, any warranty is void. In case of non-conformance, user needs to contact us immediately for replacement or refund.
Liability	This product is for in vitro research use only. Any other applications, such as diagnostics or therapeutics, or in vivo experiments, and the validation of this product therein, are solely at the responsibility of the buyer/user.
Product performance	see next pages

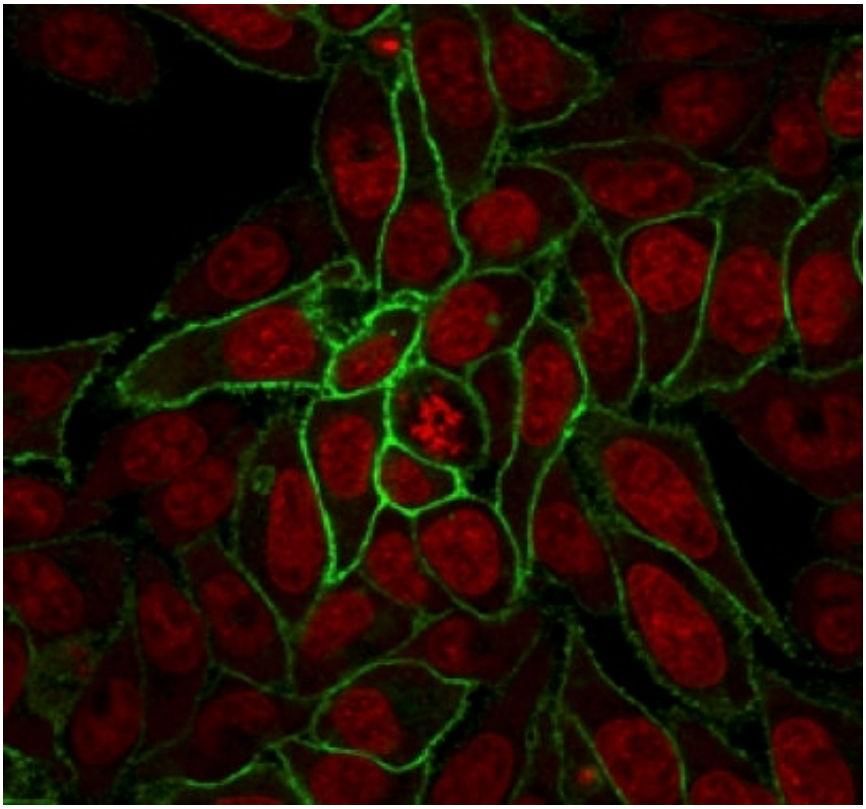
Product data:

ImmunoHistoChemistry (IHC):
This product was successfully used to stain human breast cancer sections. Recommended concentration: 1-3ug/ml



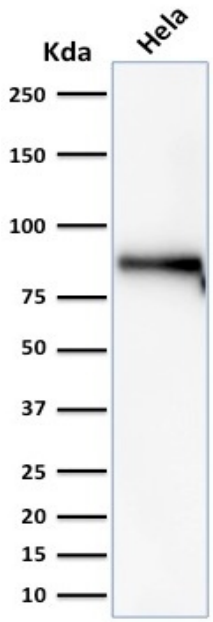
Formaldehyde-fixed, paraffin-embedded human breast cancer stained with CTNNB1 Recombinant Mouse Antibody AE00113 at 1-2ug/ml for 30 minutes at RT. Epitope retrieval: Boiling at pH8 for 10-20 min followed by 20 min cooling. DAB staining by HRP polymer.

ImmunoCytoChemistry (ICC):
This product was successfully used to stain plasma membranes in HeLa. Recommended concentration: 1-3ug/ml



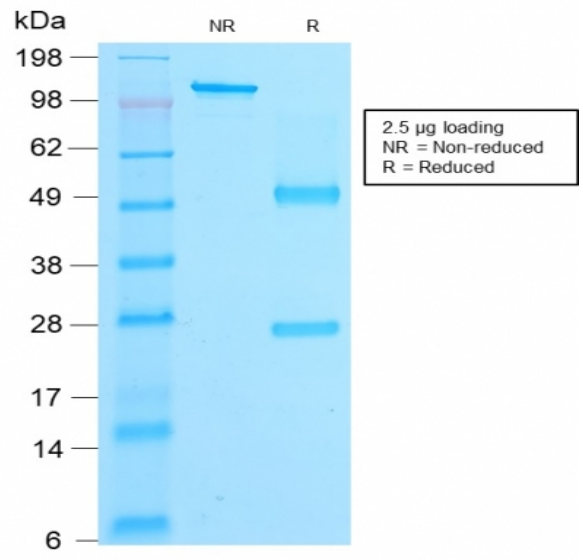
HeLa cells stained with CTNNB1 Mouse Recombinant Antibody AE00113 at 1-2ug/ml for 1h at RT. Detection by confocal microscopy using CF488 (green) for the antibody and RedDot (red) for nuclear staining.

Western Blot (WB):
This product was successfully used to stain an approx. 85kDa band in lysates of cell line HeLa.
Recommended concentration: 1-3ug/ml



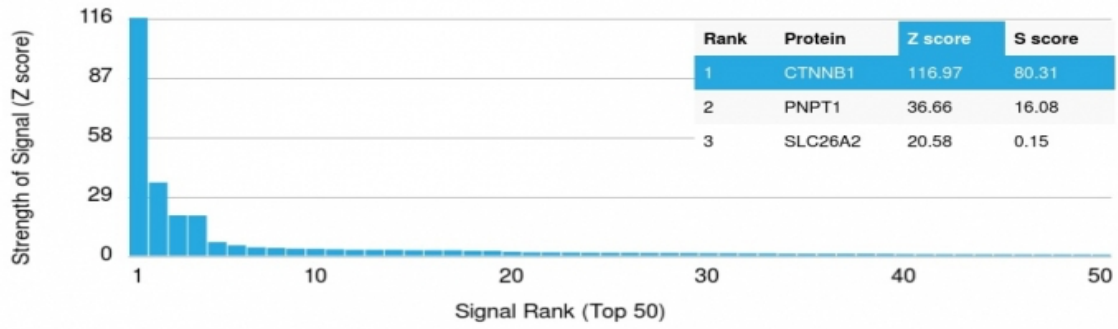
Western Blot of a HeLa lysate (30ug) stained with CTNNB1 Mouse Recombinant Antibody AE00113 at 1-2ug/ml (1h at ambient temp). ECL staining by HRP.

SDS-PAGE Analysis of Purified CTNNB1 Recombinant Mouse Antibody AE00113. Confirmation of Purity and Integrity of Antibody.



Integrity of the purified antibody AE00113 under non-reduced and reduced conditions, showing intact IgG at around 110kDa (NR) and intact heavy and light chains at 50kDa and 25kDa resp. (R).

Specificity and selectivity of AE00113 to CTNNB1 were tested against >19,000 full-length human proteins on a human protein array. A protein BLAST search against H. sapiens revealed the following related other proteins: CTNNG and ARMC4. These were part of the array used and showed no cross-reactivity signals.



Rank	Protein	Z score	S score
1	CTNNB1	116.97	80.31
2	PNPT1	36.66	16.08
3	SLC26A2	20.58	0.15

Cross-reactivity assessment of CTNNB1 Mouse Recombinant Antibody AE00113 (1ug/ml) on CDI's Protein Array containing more than 19,000 full-length human proteins.

The Z-score represents the strength of a signal that an antibody (through a fluorophore-tagged secondary reagent) produces when binding to a particular protein on the array. Z-scores are in units of standard deviations (SD's) above the mean value of all signals generated on that array. When Z-scores are arranged in descending order, the difference between two successive values will be the S-score for the first. Thus, the S-score represents the relative specificity of the antibody to its intended target. An antibody is considered specific to its intended target, when it has an S-score of at least 2.5. For example, if an antibody binds to intended protein X with a Z-score of 43 and to the cross-reacting protein Y with a next Z-score of 14, then the S-score for the antibody to intended target X equals 29 (43-14).