

CoraLite® Plus 647-conjugated Beta Actin Recombinant antibody

Catalog Number: **CL647-81115**

Basic Information

Catalog Number: CL647-81115	GenBank Accession Number: BC002409	Purification Method: Protein A purification
Size: 1000 µg/ml	GeneID (NCBI): 60	CloneNo.: 4H1
Source: Rabbit	UNIPROT ID: P60709	Recommended Dilutions: IF 1:250-1:1000
Isotype: IgG	Full Name: actin, beta	Excitation/Emission maxima wavelengths: 654 nm / 674 nm
Immunogen Catalog Number: AG14521	Calculated MW: 375 aa, 42 kDa	
	Observed MW: 42 kDa	

Applications

Tested Applications: IF/ICC	Positive Controls: IF : MDCK cells,
Species Specificity: Human, pig, rat, mouse, canine	

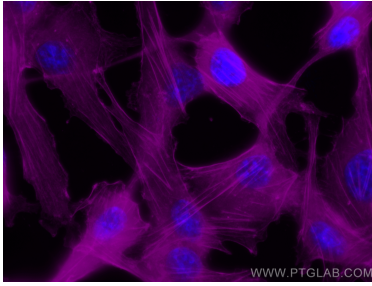
Background Information

Beta Actin, also named as ACTB and F-Actin, belongs to the actin family. Actins are highly conserved globular proteins that are involved in various types of cell motility and are ubiquitously expressed in all eukaryotic cells. At least six isoforms of actins are known in mammals and other vertebrates: alpha (ACTC1, cardiac muscle 1), alpha 1 (ACTA1, skeletal muscle) and 2 (ACTA2, aortic smooth muscle), beta (ACTB), gamma 1 (ACTG1) and 2 (ACTG2, enteric smooth muscle). Beta and gamma 1 are two non-muscle actin proteins. Most actins consist of 376aa, while ACTG2 (rich in muscles) has 375aa and ACTG1(found in non-muscle cells) has only 374aa. Beta actin has been widely used as the internal control in RT-PCR and Western Blotting as a 42-kDa protein. However, the 37-40, 31, 15 kDa cleaved fragment of beta actin can be generated during apoptosis process. This antibody was generated against N-terminal region of human beta actin protein and can cross-react with other actins. (9173887, 11217076, 10229193)

Storage

Storage:
Store at -20°C. Avoid exposure to light. Stable for one year after shipment.
Storage Buffer:
PBS with 50% Glycerol, 0.05% Proclin300, 0.5% BSA, pH 7.3.
Aliquoting is unnecessary for -20°C storage

Selected Validation Data



Immunofluorescent analysis of (-20°C Methanol) fixed MDCK cells using CoraLite® Plus 647 Beta Actin antibody (CL647-81115, Clone: 4H1) at dilution of 1:500.