

Calpain 2 polyclonal antibody

Catalog: BCP00320 Host: Rabbit Reactivity: Human, Rat, Mouse

BackGround:

Calpain is a calcium-dependent thiol proteinase that is functionally active as a heterodimer composed of a small regulatory subunit and one of at least two large catalytic subunits (calpain 1 or calpain 2). In vitro, calpain 1 (mu-calpain) requires micromolar levels of calcium, while calpain 2 (M-calpain) requires millimolar levels of calcium for activation. The regulation of calpain in vivo is the subject of many current studies, which suggest that proteolytic activity is regulated post-transcriptionally by mechanisms such as calcium requirements, subcellular localization of the heterodimer, phosphorylation via the EGFR-Erk signaling cascade, endogenous inhibitors (calpastatin) and autoproteolytic cleavage. Calpastatin negatively regulates autoproteolytic cleavage of calpain 1 between Gly27 and Leu28. Calpain influences cell migration by modifying rather than degrading its substrates responsible for cell adhesion and cytoskeletal arrangement. Control of calpain activity has caught the attention of drug development since limiting its activity could mute invasiveness of tumors or chronic inflammation.

Product:

Rabbit IgG, 1mg/ml in PBS with 0.02% sodium azide, 50% glycerol, pH7.2.

Molecular Weight:

~ 80 kDa

Swiss-Prot:

P17655

Purification&Purity:

The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen and the purity is > 96% (by SDS-PAGE).

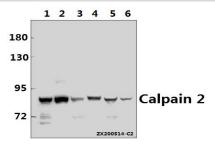
Applications:

WB: 1:5000~1:10000 IP:1:2000~1:8000 Storage&Stability: Store at $4\,\mathrm{C}$ short term. Aliquot and store at $-20\,\mathrm{C}$ long term. Avoid freeze-thaw cycles.

Specificity:

Calpain 2 polyclonal antibody detects endogenous levels of Calpain 2 protein.

DATA:



Western blot (WB) analysis of Calpain 2 polyclonal antibody at 1:5000 dilution

Lane1:Hela whole cell lysate(30ug)

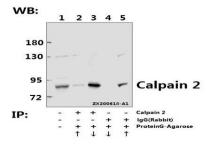
Lane2:A375 whole cell lysate(30ug)

Lane3:The Skin tissue lysate of Rat(40ug)

Lane4:SGC7901 whole cell lysate(40ug)

Lane5:P12 whole cell lysate(40ug)

Lane6:AML-12 whole cell lysate(40ug)



Immunoprecipitation - Calpain 2 Polyclonal Antibody

Note:

For research use only, not for use in diagnostic procedure.