FAM129B (Phospho-Tyr593) Antibody

#58027

Number: 58027

Amount: 100μg/100μl

Form of Antibody: Rabbit IgG in phosphate buffered saline (without Mg2+ and Ca2+), pH 7.4, 150mM NaCl,0.02% sodium azide and 50% glycerol.

Storage/Stability: Store at -20℃/1 year

Immunogen: synthetic phosphopeptide corresponding to residues surrounding Tyr593 of human FAM129B

Purification: The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific phosphopeptide. The antibody against non-phosphopeptide was removed by chromatography using non-phosphopeptide corresponding to the phospholation site.

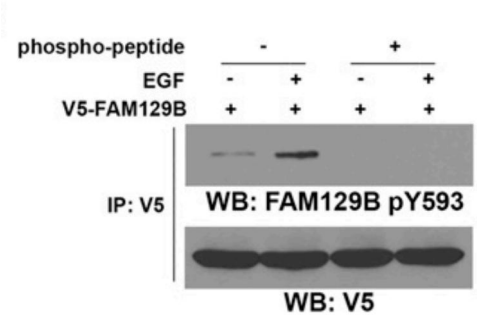
Specificity/Sensitivity: FAM129B（Phospho-Tyr593)antibody detects endogenous levels of FAM129B only when phospholated at Tyrosine593 .

Reactivity: Human

Applications:

Predicted MW: 95KD

WB **:**1:500~1:1000 IHC:1:50-200



pCep4 – EGFR was cotransfected with V5-tagged FAM129B into 293T cells. These cells were treated with EGF (100 ng/mL) for 15 min. Immunoprecipitation of V5 was followed by immunoblotting with an anti-FAM129B pY593 antibody in the presence or absence of specific competing phosphopeptides.

Background : EGFR phosphorylates the Y593 residue of the protein known as family with sequence similarity 129, member B (FAM129B), which is overexpressed in many types of human cancer. FAM129B phosphorylation increased the interaction between FAM129B and Ras, resulting in reduced binding of p120-RasGAP to Ras. FAM129B phosphorylation promoted Ras activation, increasing ERK1/2- and PKM2-dependent β -catenin transactivation and leading to the enhanced glycolytic gene expression and the Warburg effect; promoting tumor cell proliferation and invasion; and supporting brain tumorigenesisl [1] .

Reference:[1] Ji H, Lee JH, Wang Y, Pang Y, Zhang T, Xia Y, Zhong L, Lyu J, Lu Z. EGFR phosphorylates FAM129B to promote Ras activation. ***Proc Natl Acad Sci U S A.*** 2016 Jan 19;113(3):644-9. doi: 10.1073/pnas.1517112113.