BOSTER
antibody and ELISA experts

BOSTER BIOLOGICAL TECHNOLOGY
3942 B Valley Ave, Pleasanton, CA 94566
888-466-3604 | support@bosterbio.com | www.bosterbio.com

Anti-c-Fos Antibody Picoband®

Catalog Number: PA1318

About FOS

The human oncogene c-fos is cellular homolog of the transforming gene of Finkel-Biskis-Jinkins (FBJ) murine osteosarcoma virus which was mapped to a single human chromosome. c-Fos is encoded by the FOS gene. FOS was the first transcription factor identified that has a critical function in regulating the development of cells destined to form and maintain the skeleton. FOS is also a major component of the activator protein-1 (AP-1) transcription factor complex, which includes members of the JUN family. c-fos is a major nuclear target for signal transduction pathways involved in the regulation of cell growth, differentiation, and transformation. Using transgenic and knockout mice, Grigoriadis et al. (1995) established a unique role for the proto-oncogene and nuclear transcription factor, Fos, in regulating the differentiation and activity of specific bone cell populations, both during normal development and in bone disease.

Overview

Product Name	Anti-c-Fos Antibody Picoband®
Reactive Species	Human, Mouse, Rat
Description	Boster Bio Anti-c-Fos Antibody catalog # PA1318. Tested in WB applications. This antibody reacts with Human, Mouse, Rat. The brand Picoband indicates this is a premium antibody that guarantees superior quality, high affinity, and strong signals with minimal background in Western blot applications. Only our best-performing antibodies are designated as Picoband, ensuring unmatched performance.
Application	WB
Clonality	Polyclonal
Formulation	Each vial contains antibody formulated with stabilizing components, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg Thimerosal, 0.05mg NaN3. *This antibody is supplied in a stabilized formulation. Compatibility with conjugation reactions depends on the chemistry of the conjugation method used. For conjugation methods that are not compatible with the stabilizing components present in this formulation, a carrier-free antibody format is required.
Storage Instructions	Store at -20˚C for one year from date of receipt. After reconstitution, at 4˚C for one month. It can also be aliquotted and stored frozen at -20˚C for six months. Avoid repeated freeze-thaw cycles.
Host	Rabbit
Uniprot ID	P01100

Technical Details

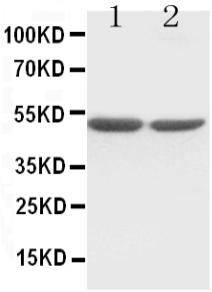
Immunogen	A synthetic peptide corresponding to a sequence in the middle region of human c-Fos, identical to the related rat and mouse sequences.
Recommended Detection Systems	Boster recommends Enhanced Chemiluminescent Kit with anti-Rabbit IgG (EK1002) for Western

BOSTER BIOLOGICAL TECHNOLOGY
3942 B Valley Ave, Pleasanton, CA 94566
888-466-3604 | support@bosterbio.com | www.bosterbio.com

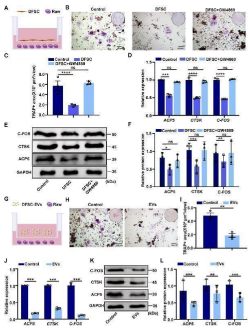
	blot.
Cross Reactivity	No cross-reactivity with other proteins
Isotype	Rabbit IgG
Form	Lyophilized
Concentration	Adding 0.2 ml of distilled water will yield a concentration of 500 ug/ml.
Purification	Immunogen affinity purified.
Suggested Dilutions	Western blot, 0.1-0.5ug/ml, Human, Rat, Mouse

BOSTER BIOLOGICAL TECHNOLOGY
3942 B Valley Ave, Pleasanton, CA 94566
888-466-3604 | support@bosterbio.com | www.bosterbio.com

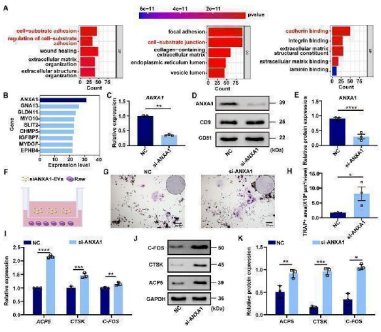
Anti-c-Fos Antibody Picoband® (PA1318) Images



Anti-c-Fos antibody, PA1318, Western blottingLane 1: HT1080 Cell LysateLane 2: COLO320 Cell Lysate



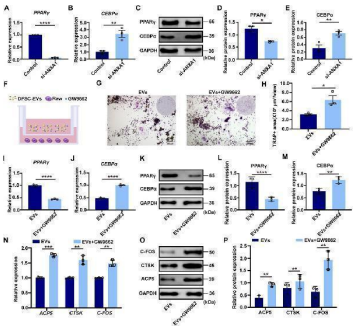
DFSC-EVs regulated tooth eruption by inhibiting osteoclast differentiation. (A) Schematic illustration of RAW264.7 and DFSC co-culture system. (B) Representative images of TRAP staining. Scale bar = 200 um. (C) Quantitative analysis of TRAP-positive area. (D) The mRNA level of ACP5 , CTSK and CFOS in RAW264.7 cultured with DFSC. (E) The protein level of ACP5, CTSK and CFOS in RAW264.7 cultured with DFSC. (F) Western blotting quantification. (G) Schematic illustration of RAW264.7 and DFSC-EVs co-culture system. (H) Representative images of TRAP staining. Scale bar = 200 um. (I) Quantitative analysis of TRAP-positive area. (J) The mRNA level of ACP5 , CTSK and CFOS in RAW264.7 cultured with DFSC-EVs. (K) The protein level of ACP5, CTSK and CFOS in RAW264.7 cultured with DFSC-EVs. (L) Western blotting quantification. ns, not significant. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, **** $p < 0.0001$. n = 3.Index in PubMed under a CC BY license. PMID: 39834384



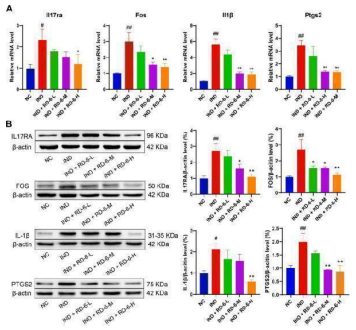
ANXA1 was the core factor of DFSC-EVs regulating osteoclast differentiation. (A) Gene ontology enrichment analysis of DFSC-EVs protein profiles. (B) The top proteins of Cadherin related to regulating osteoblast differentiation based on expression level. (C) The mRNA level of ANXA1 . (D) The protein level of ANXA1. (E) Western blotting quantification. (F) Schematic illustration of RAW264.7 and siANXA1-EVs co-culture system. (G) Representative images of TRAP staining. Scale bar = 200 um. (H) Quantitative analysis of TRAP-positive area. (I) The mRNA level of ACP5 , CTSK and CFOS in RAW264.7 cultured with siANXA1-EVs. (J) The protein level of ACP5, CTSK and CFOS in RAW264.7 cultured with siANXA1-EVs. (K) Western blotting quantification. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, **** $p < 0.0001$. n = 3.Index in PubMed under a CC BY license. PMID: 39834384

ANXA1 mediated PPARgamma-CEBPalpha pathway to regulate osteoclast differentiation (A) The mRNA level of PPARgamma in RAW264.7 cultured with siANXA1-EVs. (B) The mRNA level of CEBPalpha in RAW264.7 cultured with siANXA1-EVs. (C) The protein level of PPARgamma and CEBPalpha in RAW264.7 cultured with siANXA1-EVs. (D)

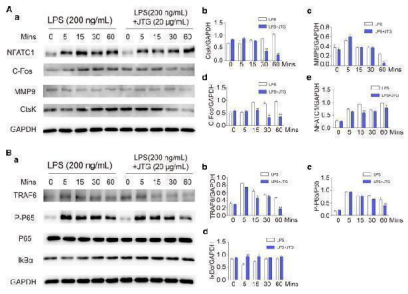
BOSTER BIOLOGICAL TECHNOLOGY
3942 B Valley Ave, Pleasanton, CA 94566
888-466-3604 | support@bosterbio.com | www.bosterbio.com



Quantitative analysis of PPARgamma protein expression. (E) Quantitative analysis of CEBPalpha protein expression. (F) Schematic illustration of PPARgamma inhibited RAW264.7 and DFSC-EVs co-culture system. (G) Representative images of TRAP staining. Scale bar = 200 um. (H) Quantitative analysis of TRAP-positive area. (I) PPARgamma inhibited RAW264.7 construction. (J) The mRNA level of CEBPalpha in PPARgamma inhibited RAW264.7. (K) The protein level of PPARgamma and CEBPalpha in PPARgamma inhibited RAW264.7. (L) Quantitative analysis of PPARgamma protein expression. (M) Quantitative analysis of CEBPalpha protein expression. (N) The mRNA level of ACP5 , CTSK and CFOS in PPARgamma inhibited RAW264.7. (O) The protein level of ACP5, CTSK and CFOS in PPARgamma inhibited RAW264.7. (P) Western blotting quantification. * $p < 0.05$, ** $p < 0.01$, *** $p < 0.001$, **** $p < 0.0001$. n = 3.Index in PubMed under a CC BY license. PMID: 39834384



The pretreatment of RD-6 inhibited the IL-17 signaling pathway in indomethacin-induced GU rats. The expression of IL17RA, FOS, IL1B, and PTGS2 determined in gastric tissue by qRT-PCR (A) and western bloting (B) . Data are expressed as mean ± S.E.M (n = 3). One-way ANOVA with the uncorrected Fisher's LSD test was used to evaluate multiple comparisons. # $p < 0.05$, ## $p < 0.01$ vs. NC group; * $p < 0.05$, ** $p < 0.01$ vs. IND group. NC, normal control; IND, indomethacin; RD-6-L, M, and H represent Ruda-6 at low, medium and high doses, respectively.Index in PubMed under a CC BY license. PMID: 37637418



Effects of JTG on expression of associated proteins and NF-kappaB pathway of osteoclast induced from BMMs with RANKL and LPS. BMMs were incubated with RANKL and JTG for 48 h, the proteins were extracted to analyze associated proteins of osteoclast by Western blot. A : a Western blot imagines for expression of NFATc1, c-Fos, Cathepsin K and MMP9. A : b – e The quantification analysis of NFATc1, c-Fos, Cathepsin K and MMP9 based on the results of A : a by ECL detection system, respectively. B : a The images of Western blot for TRAF6, P-P65, P65 and IkappaBalpha. B : b – d The quantification analysis of TRAF6, P-P65/P65 and IkappaBalpha based on the results of B : a by using an ECL detection system, respectively. Each point represents the mean ± SD (n = 3). The experiments were repeated for three times. * P

17 Publications Citing This Product

1. PubMed ID: 10.3390/cancers11030306, NMDA Receptor Signaling Mediates cFos Expression via Top2beta-Induced DSBs in Glioblastoma Cells

2. PubMed ID: 27429635, Analgesic Neural Circuits Are Activated by Electroacupuncture at Two Sets of Acupoints

3. PubMed ID: 26491460, The Expression Patterns of c-Fos and c-Jun Induced by Different Frequencies of Electroacupuncture in the Brain

Visit bosterbio.com/anti-c-fos-antibody-pa1318-boster.html to see all 17 publications.

BOSTER BIOLOGICAL TECHNOLOGY
3942 B Valley Ave, Pleasanton, CA 94566
888-466-3604 | support@bosterbio.com | www.bosterbio.com

Anti-c-Fos Antibody

For Research Use Only. Not for use in diagnostic procedures.