## SANTA CRUZ BIOTECHNOLOGY, INC.

# GMEB-2 (P-18): sc-85585



## BACKGROUND

GMEB-2 (glucocorticoid modulatory element binding protein 2), also known as PIF79 (parvovirus initiation factor p79) or P79PIF, is a DNA-binding protein that plays a crucial role modulating transcription upon activation by steroid hormones. GMEB-2 is ubiquitously expressed with preferential expression in developmentally important tissues, such as testis, bone marrow, placenta and fetal tissues. It localizes to the nucleus and cytoplasm and contains a SAND domain near its N-terminus and a C-terminal coiled coil structure. GMEB-2 functions as a homodimer or as a heterodimer with GMEB-1. The formed complex specifically binds to glucocorticoid modulatory elements (GME) in the promoter region of target genes and recruits the histone acetylase CREB binding protein (CBP) during glucocorticoid signaling. This acts to increase sensitivity to low concentrations of glucocorticoids. In addition, GMEB-2 functions as an auxiliary factor required for parvovirus replication.

## CHROMOSOMAL LOCATION

Genetic locus: GMEB2 (human) mapping to 20q13.33; Gmeb2 (mouse) mapping to 2 H4.

## SOURCE

GMEB-2 (P-18) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of GMEB-2 of human origin.

## PRODUCT

Each vial contains 200  $\mu g$  lgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-85585 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## **STORAGE**

Store at 4° C, \*\*D0 NOT FREEZE\*\*. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

## **APPLICATIONS**

GMEB-2 (P-18) is recommended for detection of GMEB-2 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2  $\mu$ g per 100-500  $\mu$ g of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with GMEB-1.

GMEB-2 (P-18) is also recommended for detection of GMEB-2 in additional species, including equine and canine.

Suitable for use as control antibody for GMEB-2 siRNA (h): sc-75156, GMEB-2 siRNA (m): sc-145645, GMEB-2 shRNA Plasmid (h): sc-75156-SH, GMEB-2 shRNA Plasmid (m): sc-145645-SH, GMEB-2 shRNA (h) Lentiviral Particles: sc-75156-V and GMEB-2 shRNA (m) Lentiviral Particles: sc-145645-V.

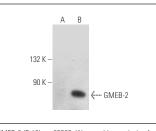
Molecular Weight of GMEB-2: 79 kDa.

Positive Controls: GMEB-2 (h): 293 Lysate: sc-114627, HeLa nuclear extract: sc-2120 or K-562 nuclear extract: sc-2130.

#### **RECOMMENDED SECONDARY REAGENTS**

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker<sup>™</sup> compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker<sup>™</sup> Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz<sup>™</sup> Mounting Medium: sc-24941.

#### DATA



GMEB-2 (P-18): sc-85585. Western blot analysis of GMEB-2 expression in non-transfected: sc-110760 (A) and human GMEB-2 transfected: sc-114627 (B) 293 whole cell lysates.

## **RESEARCH USE**

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

#### **PROTOCOLS**

See our web site at www.scbt.com or our catalog for detailed protocols and support products.

## MONOS Satisfation Guaranteed

Try **GMEB-2 (364C1a): sc-81093**, our highly recommended monoclonal alternative to GMEB-2 (P-18).