## SANTA CRUZ BIOTECHNOLOGY, INC.

# Crk-L (B-1): sc-365092



### BACKGROUND

SH2 and SH3 (Src homology) domains were originally identified as critical functional domains within non-receptor proteins with tyrosine kinase activity. A subset of these proteins appears to exist predominately of SH2/SH3 domains in the absence of detectable catalytic domains. One of the first members of the family to be identified, Crk, is a transformation-specific protein that induces elevation of cellular phosphotyrosine levels, but lacks tyrosine kinase activity itself. A second protein, Nck, consists solely of three SH3 domains and one SH2 domains. A member of this protein class, Crk-L, is encoded by a gene located on chromosome 22, band 11, centromeric of the chronic myelogenous leukemia breakpoint region. Crk-L encodes a 303 amino acid protein with one SH2 and two SH3 domains.

## **CHROMOSOMAL LOCATION**

Genetic locus: CRKL (human) mapping to 22q11.21; Crkl (mouse) mapping to 16 A3.

## SOURCE

Crk-L (B-1) is a mouse monoclonal antibody raised against amino acids 181-242 of Crk-L of human origin.

## PRODUCT

Each vial contains 200  $\mu g$  IgG\_1 kappa light chain in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Crk-L (B-1) is available conjugated to agarose (sc-365092 AC), 500  $\mu$ g/0.25 ml agarose in 1 ml, for IP; to HRP (sc-365092 HRP), 200  $\mu$ g/ml, for WB, IHC(P) and ELISA; to either phycoerythrin (sc-365092 PE), fluorescein (sc-365092 FITC), Alexa Fluor<sup>®</sup> 488 (sc-365092 AF488), Alexa Fluor<sup>®</sup> 546 (sc-365092 AF546), Alexa Fluor<sup>®</sup> 594 (sc-365092 AF594) or Alexa Fluor<sup>®</sup> 647 (sc-365092 AF647), 200  $\mu$ g/ml, for WB (RGB), IF, IHC(P) and FCM; and to either Alexa Fluor<sup>®</sup> 680 (sc-365092 AF680) or Alexa Fluor<sup>®</sup> 790 (sc-365092 AF790), 200  $\mu$ g/ml, for Near-Infrared (NIR) WB, IF and FCM.

Alexa Fluor® is a trademark of Molecular Probes, Inc., Oregon, USA

#### **APPLICATIONS**

Crk-L (B-1) is recommended for detection of Crk-L of mouse, rat and human origin by Western Blotting (starting dilution 1:100, 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).

Suitable for use as control antibody for Crk-L siRNA (h): sc-35114, Crk-L siRNA (m): sc-35115, Crk-L shRNA Plasmid (h): sc-35114-SH, Crk-L shRNA Plasmid (m): sc-35115-SH, Crk-L shRNA (h) Lentiviral Particles: sc-35114-V and Crk-L shRNA (m) Lentiviral Particles: sc-35115-V.

Molecular Weight of Crk-L: 36 kDa.

Positive Controls: Crk-L (h): 293T Lysate: sc-128367, HeLa whole cell lysate: sc-2200 or A-431 whole cell lysate: sc-2201.

#### STORAGE

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

## DATA



Crk-L (B-1): sc-365092. Western blot analysis of Crk-L expression in non-transfected 293T: sc-117752 (A), human Crk-L transfected 293T: sc-128367 (B) and A-431 (C) whole cell lysates.



Simultaneous direct near-infrared western blot analysis of Crk-L expression, detected with Crk-L (B-1) Alexa Fluor<sup>6</sup> 790: sc-365092 AF790 and  $\beta$ -Actin expression, detected with  $\beta$ -Actin (C4) Alexa Fluor<sup>6</sup> 680: sc-47778 AF680 in HeL a whole cell lysate. Blocked with UltraCruz<sup>®</sup> Blocking Reagent: sc-516214.

## **SELECT PRODUCT CITATIONS**

- Gill, M.B., et al. 2015. KSHV-TK is a tyrosine kinase that disrupts focal adhesions and induces Rho-mediated cell contraction. EMBO J. 34: 448-465.
- Nabekura, T., et al. 2018. Crk adaptor proteins regulate NK cell expansion and differentiation during mouse cytomegalovirus infection. J. Immunol. 200: 3420-3428.
- 3. Wu, S., et al. 2020. A novel micropeptide encoded by Y-linked LINC00278 links cigarette smoking and AR signaling in male esophageal squamous cell carcinoma. Cancer Res. 80: 2790-2803.
- Badu-Nkansah, K. and Lechler, T. 2020. Proteomic analysis of desmosomes reveals novel components required for epidermal integrity. Mol. Biol. Cell 31: 1140-1153.
- 5. Oury, J., et al. 2021. Mechanism of disease and therapeutic rescue of Dok7 congenital myasthenia. Nature 595: 404-408.
- Estrada, A., et al. 2021. Phosphorylation of Crk-L S114 induced by common γ chain cytokines and T-cell receptor signal transduction. Sci. Rep. 11: 16951.
- Weiss, J.M., et al. 2022. Anatomic position determines oncogenic specificity in melanoma. Nature 604: 354-361.

#### **RESEARCH USE**

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

### PROTOCOLS

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