

# ZFAND1 (A-14): sc-87505

## BACKGROUND

Zinc-finger proteins contain DNA-binding domains and have a wide variety of functions, most of which encompass some form of transcriptional activation or repression. The majority of zinc-finger proteins contain a Krüppel-type DNA binding domain and a KRAB domain, which is thought to interact with KAP1, thereby recruiting histone modifying proteins. ZFAND1 (AN1-type zinc finger protein 1) is a 268 amino acid protein that contains 2 AN1-type zinc fingers, which are often found in proteins that contain a ubiquitin-like domain and therefore play a role in the ubiquitination pathway. AN1-type zinc fingers contains six conserved cysteines and two histidines and have a dimetal (zinc)-bound  $\alpha/\beta$  fold. There are two isoforms of ZFAND1 that are produced as a result of alternative splicing events.

## REFERENCES

1. Linnen, J.M., et al. 1993. Two related localized mRNAs from *Xenopus laevis* encode ubiquitin-like fusion proteins. *Gene* 128: 181-188.
2. Klug, A. 1999. Zinc finger peptides for the regulation of gene expression. *J. Mol. Biol.* 293: 215-218.
3. Laity, J.H., et al. 2001. Zinc finger proteins: new insights into structural and functional diversity. *Curr. Opin. Struct. Biol.* 11: 39-46.
4. Matthews, J.M., et al. 2002. Zinc fingers—folds for many occasions. *IUBMB Life* 54: 351-355.
5. Huang, J., et al. 2004. ZNF216 Is an A20-like and I $\kappa$ B kinase  $\gamma$ -interacting inhibitor of NF $\kappa$ B activation. *J. Biol. Chem.* 279: 16847-16853.
6. Brown, R.S. 2005. Zinc finger proteins: getting a grip on RNA. *Curr. Opin. Struct. Biol.* 15: 94-98.
7. Hall, T.M. 2005. Multiple modes of RNA recognition by zinc finger proteins. *Curr. Opin. Struct. Biol.* 15: 367-373.

## CHROMOSOMAL LOCATION

Genetic locus: ZFAND1 (human) mapping to 8q21.13; Zfand1 (mouse) mapping to 3 A1.

## SOURCE

ZFAND1 (A-14) is an affinity purified rabbit polyclonal antibody raised against a peptide mapping within an internal region of ZFAND1 of human origin.

## PRODUCT

Each vial contains 100  $\mu$ g IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-87505 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

Available as TransCruz reagent for Gel Supershift and ChIP applications, sc-87505 X, 100  $\mu$ g/0.1 ml.

## STORAGE

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

## APPLICATIONS

ZFAND1 (A-14) is recommended for detection of ZFAND1 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).

ZFAND1 (A-14) is also recommended for detection of ZFAND1 in additional species, including equine, canine, porcine and avian.

Suitable for use as control antibody for ZFAND1 siRNA (h): sc-77865, ZFAND1 siRNA (m): sc-155512, ZFAND1 shRNA Plasmid (h): sc-77865-SH, ZFAND1 shRNA Plasmid (m): sc-155512-SH, ZFAND1 shRNA (h) Lentiviral Particles: sc-77865-V and ZFAND1 shRNA (m) Lentiviral Particles: sc-155512-V.

ZFAND1 (A-14) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

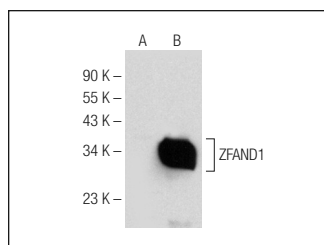
Molecular Weight of ZFAND1: 31 kDa.

Positive Controls: ZFAND1 (m): 293T Lysate: sc-124732.

## RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ 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 goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

## DATA



ZFAND1 (A-14): sc-87505. Western blot analysis of ZFAND1 expression in non-transfected: sc-117752 (A) and mouse ZFAND1 transfected: sc-124732 (B) 293T whole cell lysates.

## RESEARCH USE

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

## PROTOCOLS

See our web site at [www.scbt.com](http://www.scbt.com) or our catalog for detailed protocols and support products.