

# ZPLD1 (G-14): sc-103361



The Power to Question

## BACKGROUND

Many proteins containing ZP (zona pellucida) domains play fundamental roles in development, immunity, hearing and cancer. These domains are located near the carboxy-terminus of the polypeptide and typically consist of approximately 260 amino acids. ZP domain-containing proteins are often glycosylated and are usually present in filaments or matrices and therefore are thought to be involved in protein polymerization. ZPLD1 (zona pellucida-like domain-containing protein 1) is a 415 amino acid single-pass transmembrane protein that contains one ZP domain. The gene encoding ZPLD1 maps to human chromosome 3, which is made up of about 214 million bases encoding over 1,100 genes, including a chemokine receptor (CKR) gene cluster and a variety of human cancer-related gene loci. There are two isoforms of ZPLD1 that are produced as a result of alternative splicing events.

## REFERENCES

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## CHROMOSOMAL LOCATION

Genetic locus: ZPLD1 (human) mapping to 3q12.3; Zpld1 (mouse) mapping to 16 C1.1.

## RESEARCH USE

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

## SOURCE

ZPLD1 (G-14) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an extracellular domain of ZPLD1 of human origin.

## PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-103361 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

ZPLD1 (G-14) is recommended for detection of ZPLD1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), 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 ZPLD1 siRNA (h): sc-78484, ZPLD1 siRNA (m): sc-155828, ZPLD1 shRNA Plasmid (h): sc-78484-SH, ZPLD1 shRNA Plasmid (m): sc-155828-SH, ZPLD1 shRNA (h) Lentiviral Particles: sc-78484-V and ZPLD1 shRNA (m) Lentiviral Particles: sc-155828-V.

Molecular Weight of ZPLD1: 46 kDa.

## 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™ compatible donkey anti-goat IgG-HRP: sc-2033 (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) 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™ Mounting Medium: sc-24941.

## STORAGE

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

## PROTOCOLS

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