

# p-Rsk-1/2/4 (Ser 363)-R: sc-17033-R

## BACKGROUND

The family of ribosomal S6 kinases (Rsk), designated Rsk-1 (or MAPKAP kinase-1), Rsk-2 and Rsk-3, are intracellular serine/threonine kinases that are important signaling intermediates in response to a broad range of ligand activated receptor tyrosine kinases. A unique feature common to the members of the Rsk family is that each possesses two non-identical complete kinase catalytic domains. An additional Rsk protein, Rsk-4, shows a high level of homology to the three previously isolated members of the human Rsk family. Rsk-4 is most abundantly expressed in brain and kidney and plays a role in normal neuronal development. The family of ribosomal S6 kinases includes p70 S6 kinase and p70 S6 kinase  $\beta$ , which are thought to have similar regulatory functions. MSK1 (also designated RLPK) is a novel Rsk-related protein, which, like the p90 Rsk family members, contains two non-identical complete kinase catalytic domains.

## REFERENCES

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## STORAGE

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

## SOURCE

p-Rsk-1/2/4 (Ser 363)-R is an affinity purified rabbit polyclonal antibody raised against a short amino acid sequence containing phosphorylated Ser 363 of Rsk-2 of human origin.

## PRODUCT

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

Blocking peptide available for competition studies, sc-17033 P, (100  $\mu$ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

## APPLICATIONS

p-Rsk-1/2/4 (Ser 363)-R is recommended for detection of Ser 363 phosphorylated Rsk-1, -2 and -4 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).

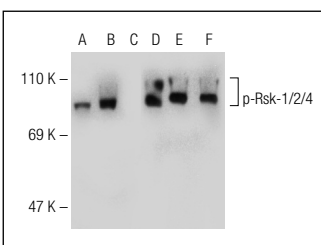
p-Rsk-1/2/4 (Ser 363)-R is also recommended for detection of correspondingly phosphorylated Ser on Rsk-1/2/4 in additional species, including equine, canine, bovine, porcine and avian.

Molecular Weight of p-Rsk-1 and p-Rsk-4: 90 kDa.

Molecular Weight of p-Rsk-2: 80 kDa.

Positive Controls: HeLa whole cell lysate: sc-2200 or HeLa + serum-starved + PMA cell lysate: sc-24695.

## DATA



Western blot analysis of Rsk-1/2/4 phosphorylation in untreated (A,D), serum-starved, PMA-treated (B,E), serum-starved, PMA and lambda protein phosphatase (sc-200312A) treated (C,F) HeLa whole cell lysates. Antibodies tested include p-Rsk-1/2/4 (Ser 363)-R: sc-17033-R (A,B,C) and Rsk-1 (C-21): sc-231 (D,E,F).

## 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.