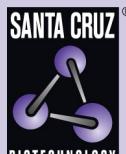


pADPr (3H2844): sc-71848



The Power to Question

BACKGROUND

Poly(ADP-ribosylation) is a method of DNA damage-dependent posttranslational modification that helps to rescue injured proliferating cells from cell death. The PARP (poly[ADP-ribose] polymerase) proteins comprise a superfamily of enzymes that functionally modify histones and other nuclear proteins, thereby preventing cell death. PARPs use NAD⁺ as a substrate to catalytically transfer ADP-ribose residues onto protein acceptors; a process that, when repeated multiple times, leads to the formation of poly(ADP-ribose) (pADPr) chains that exist either independently or attached to a target protein. The presence of these chains alters the function of the target protein and promotes cell survival. Additionally, pADPr chains are thought to be important for cell-cycle progression and cellular responses to DNA damage.

REFERENCES

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SOURCE

pADPr (3H2844) is a mouse monoclonal antibody raised against Poly(ADP-ribose) mixed with methylated bovine serum albumin.

PRODUCT

Each vial contains 100 µg IgG₃ in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

pADPr (3H2844) is recommended for detection of poly(ADP-ribose) polymer (pADPr) synthesized by a variety of pADPr polymerase (PARP)-related enzymes including PARP-1, -2, -3, tankyrase, vPARP, sPARP and others 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); non cross-reactive with ADP-ribose, 5'-AMP or yeast RNA and may cross-reactive with bovine serum albumin.

SELECT PRODUCT CITATIONS

1. Ciszewski, W.M., Wagner, W., Kania, K.D. and Dastych, J. 2014. Interleukin-4 enhances PARP-dependent DNA repair activity *in vitro*. J. Interferon Cytokine Res. 34: 734-740.
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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.

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.