

Chk1 (phospho-S317) polyclonal antibody

Catalog: BS4040

Host: Rabbit

Reactivity: Human, Mouse, Rat

Background:

Cell cycle events are regulated by the sequential activation and deactivation of cyclin dependent kinases (Cdks) and by proteolysis of cyclins. Chk1 and Chk2 are involved in these processes as regulators of Cdks. Chk1 and Chk2 both function as essential components in the G2 DNA damage checkpoint by phosphorylating Cdc25C in response to DNA damage. Phosphorylation inhibits Cdc25C activity, thereby blocking mitosis. Cdc25A, Cdc25B and Cdc25C protein tyrosine phosphatases function as mitotic activators by dephosphorylating Cdc2 p34 on regulatory tyrosine residues. It has also been shown that Chk1 can phosphorylate Wee 1 in vitro, providing evidence that the hyperphosphorylated form of Wee 1, seen in cells delayed by Chk1 overexpression, is due to phosphorylation by Chk1. Chk1 is phosphorylated on Serine 345 (S345) in response to UV, IR and hydroxyurea (HU). Chk1 plays an essential role in the mammalian DNA damage checkpoint, embryonic development and tumor suppression.

Product:

1 mg/ml in Phosphate buffered saline (PBS) with 0.05% sodium azide, approx. pH 7.2.

Molecular Weight:

~ 56 kDa

Swiss-Prot:

O14757

Purification&Purity:

The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen and the purity is > 95% (by SDS-PAGE).

Applications:

WB: 1:500~1:1000

IHC: 1:50~1:200

Storage&Stability:

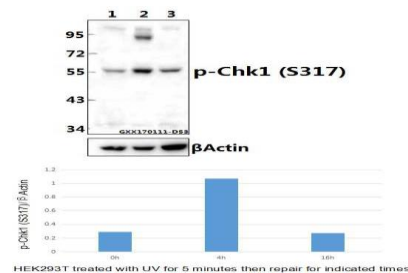
Store at 4 °C short term. Aliquot and store at -20 °C long

term. Avoid freeze-thaw cycles.

Specificity:

p-Chk1 (S317) polyclonal antibody detects endogenous levels of Chk1 protein when phosphorylated at Ser317.

DATA:

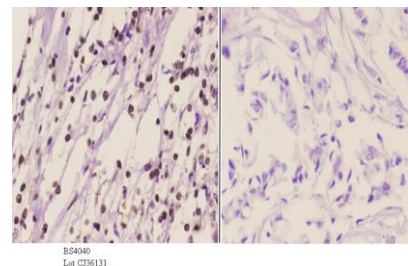


Western blot (WB) analysis of Chk1 (phospho-S317) polyclonal antibody at 1:500 dilution

Lane1:HEK293T whole cell lysate

Lane2:HEK293T treated with UV for 5 minutes then repair for 4 hours whole cell lysate

Lane3:HEK293T treated with UV for 5 minutes then repair for 16 hours whole cell lysate



Immunohistochemistry (IHC) analyzes of p-Chk1 (S317) pAb in paraffin-embedded human breast carcinoma tissue at 1:50, showing nuclear staining. Negative control (the right) Using PBS instead of primary antibody, secondary antibody is Goat Anti-Rabbit IgG-biotin followed by avidin-peroxidase.

Note:

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

Bioworld Technology, Inc.

Add: 1660 South Highway 100, Suite 500 St. Louis Park, MN 55416, USA.

Email: info@bioworld.com

Tel: 6123263284

Fax: 6122933841

Bioworld technology, co. Ltd.

Add: No 9, weidi road Qixia District Nanjing, 210046, P. R. China.

Email: info@biogot.com

Tel: 0086-025-68037686

Fax: 0086-025-68035151



PRODUCT DATA SHEET

Bioworld Technology, Inc.

Bioworld Technology, Inc.

Add: 1660 South Highway 100, Suite 500 St. Louis Park,
MN 55416, USA.

Email: info@bioworld.com

Tel: 6123263284

Fax: 6122933841

Bioworld technology, co. Ltd.

Add: No 9, weidi road Qixia District Nanjing, 210046,
P. R. China.

Email: info@biogot.com

Tel: 0086-025-68037686

Fax: 0086-025-68035151