

Anti-Phospho-Histone H3 (Thr80) rabbit pAb

Cat#: PTM-725 **Size:** 100 µl at 2.2 mg/ml
Species: Rabbit **Form:** supplied in liquid form
Antibody type: Polyclonal #
Uniprot ID: P68431

Applications	Species Reactivity	Immunogen	Molecular Wt.
ELISA, Dot, WB	Human, Mouse, Rat	phosphorylated H3 (Thr80)-KLH	17kDa

Species reactivity is determined by WB. Kept at -20°C after reconstituted.
Anti-rabbit secondary antibodies must be used to detect this antibody.

Source & Purification:

This product is produced by immunizing rabbits with a synthetic phospho peptide corresponding to residues surrounding Thr80 of human histone H3. Antibodies are purified by Protein A conjugated agarose followed by phosphorylated H3 (Thr80) peptide affinity chromatography.

Recommended Application:

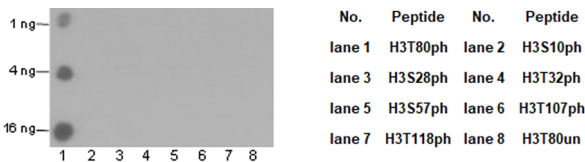
ELISA, Dot blot, Western blot.

Recommended antibody dilution: WB: 1:2000

NOTE: For WB, incubate membrane with diluted antibody in 5% nonfat milk, 1 x TBS, 0.1% Tween-20 for two hours at room temperature with gentle shaking. Prepare working dilution immediately before use. Use at an assay dependent concentration. Optimal dilutions/concentrations should be determined by the end user. Not yet tested in other applications.

Specificity:

Figure A: Dot blot



Dot blotting analysis on indicated amount of peptides using Anti-Phospho-Histone H3 (Thr80) rabbit pAb. The list of peptides is included in the table.

Figure B:

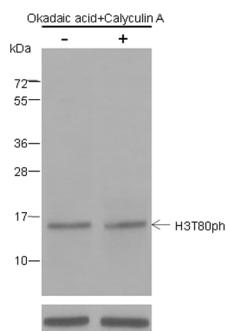
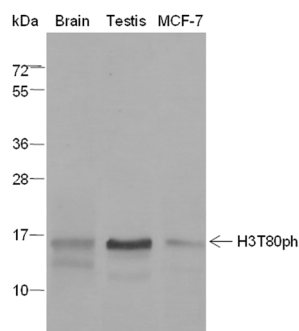
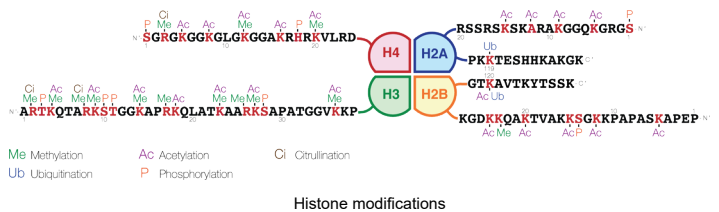


Figure C:



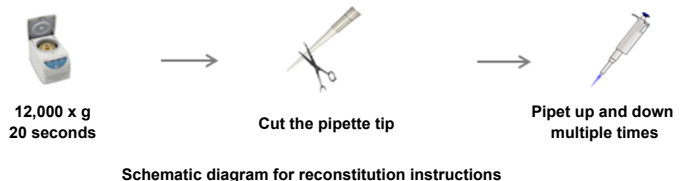
Western blotting analysis on 30 µg of crude proteins from HeLa whole cell lysates with (right) or without (left) treatment of Okadaic acid (100 nM, 60min) and calyculin A (CA, 100 nM, 1hr) (Fig. B) or from 30 µg of crude proteins from mouse brain, mouse testis whole tissue lysates and MCF-7 whole cell lysates using phospho-histone H3 (Thr80) rabbit pAb (1: 2000).

Scientific Background: Histone post-translational modifications (PTMs) are key mechanisms of epigenetics that modulate chromatin structures, termed as "histone code". The PTMs on histone including acetylation, methylation, phosphorylation and novel acylation directly affect the accessibility of chromatin to transcription factors and other epigenetic regulators, altering genome stability, gene transcription, etc. Histone phosphorylation occurs on serine, threonine and tyrosine residues on the amino-terminal of core histones. This histone mark plays roles in DNA repair, transcription and chromatin remodeling. The best-known histone phosphorylation site is histone variant H2A.x Ser139ph, which were reported to be involved in the response to DNA damage. Histone phosphorylation is mainly involved in processes during both mitosis and meiosis. Many kinases and phosphatases regulate histone phosphorylation levels.



Storage & Stability:

The antibody is kept in PBS with 50% glycerol and 0.01% sodium azide. Upon receipt, please centrifuge the antibody at 12,000 x g for 20 seconds and store the antibody at -20°C. Avoid repeated freeze/thaw cycles. Stable for 12 months from date of receipt. Leave the antibody at room temperature for 2 minutes and gently mixed using pipette before usage.



Academic Platform



Technical Support