Histone H3K4me1 Antibody, SNAP-ChIP® Certified

Catalog No	13-0040	**Type**	Mixed Monoclonal*
Lot No	22249007-81	**Host**	Rabbit
Pack Size	100 µg	**Concentration**	500 µg/mL
Applications	ChIP, ICC/IF	**Reactivity**	Human, Mouse, Wide Range (predicted)

DESCRIPTION

This antibody meets EpiCypher's "SNAP-ChIP® Certified" criteria for specificity and efficient target enrichment in a ChIP experiment (<20% cross-reactivity across the panel, >5% recovery of target input). This antibody binds to H3K4me1 and no significant cross reactivity with other lysine methylations in the EpiCypher SNAP-ChIP K-MetStat Panel (EpiCypher 19-1001) is detected.

**Mixed Monoclonal: a pool of multiple monoclonal antibodies.*

TECHNICAL INFORMATION

Immunogen	A synthetic peptide corresponding to histone H3 monomethylated at lysine 4
Storage	Stable for 1 year at -20°C from date of receipt
Formulation	Protein A affinity-purified antibody in PBS pH 7.2, 0.09% sodium azide
Target Size	15 kDa

RECOMMENDED DILUTION

Chromatin Immunoprecipitation	2 - 5 µg per 5 µg chromatin
Immunocytochemistry/Immunofluorescence	1 µg/mL

REFERENCES

VALIDATION DATA

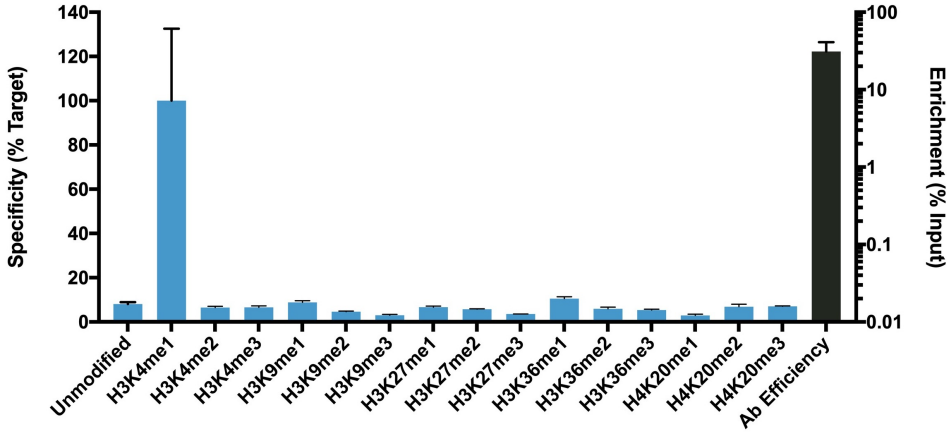

FIGURE 1: SNAP-ChIP-qPCR data. Histone H3K4me1 antibody (3 µg) was tested in a native ChIP experiment using chromatin from K562 cells (~1x10^6 cells) with the SNAP-ChIP K-MetStat Panel (EpiCypher 19-1001) spiked-in prior to micrococcal nuclease digestion. Specificity (left y-axis) was determined by qPCR for the DNA barcodes corresponding to modified nucleosomes in the SNAP-ChIP panel (x-axis). Black bar represents antibody efficiency (right y-axis; log scale) and indicates percentage of the target immunoprecipitated relative to input. Error bars represent mean ± SEM in replicate ChIP experiments.

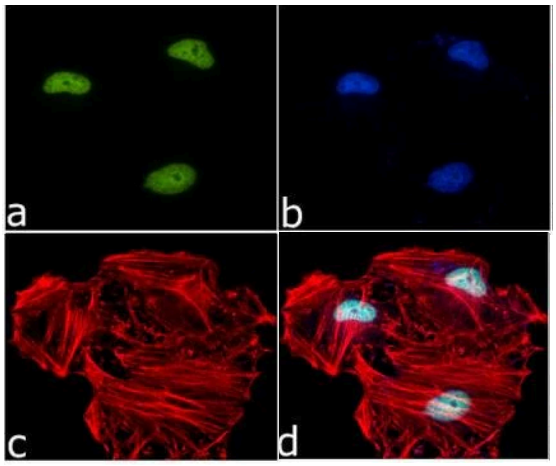

FIGURE 2: Immunocytochemistry data. ICC of HeLa cells, using Histone H3K4me1 Antibody (1 µg/mL, green, a), DAPI (blue, b), F-actin filaments (red, c), and the composite image of Panels a, b, and c (d).