



MONOCLONAL ANTIBODY

For research use only. Not for clinical diagnosis

**Catalog No. CE-037A**

## Anti- Histone H3 K9Ac [ Clone : 2G1F9 ]

### BACKGROUND

Post-translation modifications of histones modulate the accessibility and transcriptional competence of specific chromatin regions within the eukaryotic genome. Histone H3 is primarily acetylated at lysines 9, 14, 18, and 23. Acetylation at lysine 9 appears to have a dominant role in histone deposition and chromatin assembly.

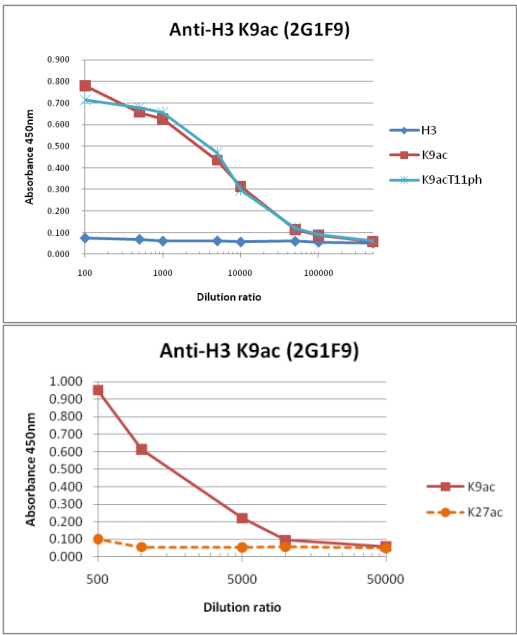
<b>Product type</b>	Primary antibodies
<b>Immunogen</b>	Synthetic peptide corresponding to N-terminal Lys9ac (aa 1-19) of human Histone H3, ARTKQTAR(ack)STGGKAPRKQ
<b>Rased in</b>	Rat
<b>Myeloma</b>	SP2
<b>Clone number</b>	2G1F9
<b>Isotype</b>	Rat IgG2a, $\kappa$
<b>Host</b>	-
<b>Source</b>	Culture supernatant
<b>Purification</b>	Ion-exchange chromatography
<b>Form</b>	Liquid
<b>Storage buffer</b>	PBS containing 50% Glycerol, 0.05% NaN <sub>3</sub> as a preservative
<b>Concentration</b>	1 mg / ml
<b>Volume</b>	100 ul
<b>Label</b>	Unlabeled
<b>Specificity</b>	Histone H3 K9ac (1-19) Epitope : Acetylated Lys9 of Histone H3
<b>Cross reactivity</b>	Human, Monkey, Mouse, Rat, Hamster
<b>Storage</b>	Store below -20°C (below -70°C for prolonged storage) Aliquot to avoid cycles of freeze/thaw.
<b>Other</b>	<b>Data Link</b> : UniProtKB/Swiss-Prot <a href="#">P68431</a> * recommended positive controls is <b>mammalian cell</b>

<b>Application notes</b>	<ul style="list-style-type: none"><li>• <b>Western blotting:</b> 1/1000 -1/5000</li><li>• <b>Immunocytochemistry:</b> 1/100 – 1/500</li><li>• <b>Immunohistochemistry:</b> 1/100 – 1/500</li><li>• <b>ChIP</b></li></ul>
Recommended dilutions	

Other applications have not been tested.  
Optimal dilutions/concentrations should be determined by the end user.

<b>References</b>	1) Strahl and Allis, Nature. 2000 Jan 6;403(6765):41-5.PMID: <a href="#">10638745</a>
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ANTIBODY CHARACTERIZATION



H3 peptide	1	ARTKQTARK	ST	GGKAPRKQ	19
H3 K9ac peptide	1	ARTKQTARK <sub>ac</sub>	ST	GGKAPRKQ	19
H3 K9acT11ph peptide	1	ARTKQTARK <sub>ac</sub>	ST <sub>ph</sub>	GGKAPRKQ	19

H3 K9ac peptide	1	ARTKQTARK <sub>ac</sub>	STGGKAPRKQ	19
H3 K27ac peptide	21	ATKAARK <sub>ac</sub>	SAPATGGVKKPH	39

Fig.1 The composition of Histone H3 peptides and the reactivity of Histone H3 K9Ac antibody, 2G1F9.

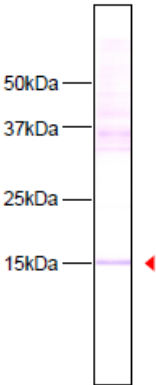
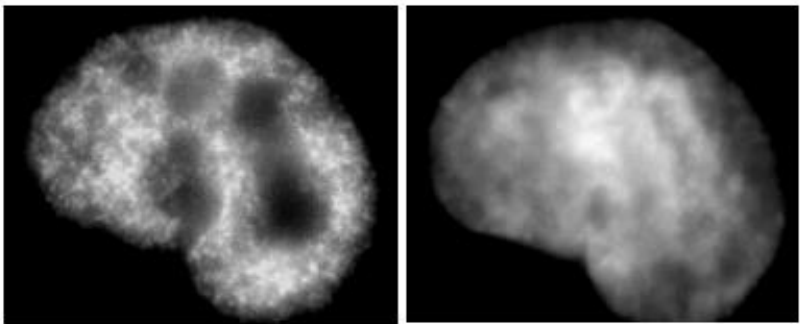


Fig.2 Western blot analysis of HeLa whole cell extracts using Histone H3 K9ac antibody, 2G1F9.



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Fig.3 Immunocytochemical analysis of HeLa Cell using Histone H3 K9ac antibody, 2G1F9.

**RELATED PRODUCTS:**

Product Name	Clone	Application	Maker	Cat#
Anti Histone H3.1/3.2 (Variant) Monoclonal Antibody	6G3C7	WB	CAC	CE-039A
Anti Histone H3.1/3.2 (Variant) Monoclonal Antibody	1D4F2	ChIP/ WB/ IC/ IHC/ IP	CAC	CE-039B
Anti Histone H3.3 (Variant) Monoclonal Antibody	6C4A3	WB	CAC	CE-040A
Anti Histone H3.3 (Variant) Monoclonal Antibody	4H2D7	ChIP/ WB/ IC/ IHC/ IP	CAC	CE-040B
Anti Histone H3 S10ph Monoclonal Antibody	6G8B7	WB/ IC	CAC	CE-034A
Anti Histone H3 T11ph Monoclonal Antibody	6G12C5	WB/ IC	CAC	CE-035A
Anti Histone H3 T32ph Monoclonal Antibody	6C7G12	WB/ IC	CAC	CE-036A
Anti Histone H3 K9Ac Monoclonal Antibody	2G1F9	ChIP/ WB/ IC/ IHC	CAC	CE-037A
Anti RNA polymerase 2, CTD Ser2ph Monoclonal Antibody	3E7C7	ChIP/ WB/ IC	CAC	CE-030A
Anti RNA polymerase 2, CTD Ser5ph Monoclonal Antibody	1H4B6	ChIP/ WB/ IC	CAC	CE-031A

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