

## Rabbit Anti-Histone H3 (di methyl K9) [Clone RM151]



**Catalogue no:** 700023

**Applications:** CHIP, WB, ICC, ELISA, Multiplex

**Concentration:** 1mg/ml

**Size:** 100ul

**Specificity:** Human

**Source:** Rabbit

**Type:** Monoclonal

**Purification:** Protein G (affinity purified)

**Storage:** +4°C

### Background:

Histone 3 is one of the core histone proteins, comprising the protein component of chromatin. Histone 3 tri methyl K9 (H3K9me<sub>2</sub>) is a histone mark generally associated with repressed chromatin. It condenses and compacts the chromatin, restricting the transcription machinery from binding and carrying out gene expression. It is often found at silenced genes and is a mark of transcriptional repression.

### Immunogen:

A dimethyl-peptide corresponding to dimethyl-histone H3 (Lys 9).

### Buffer:

50% Glycerol/PBS with 1% BSA and 0.09% sodium azide.

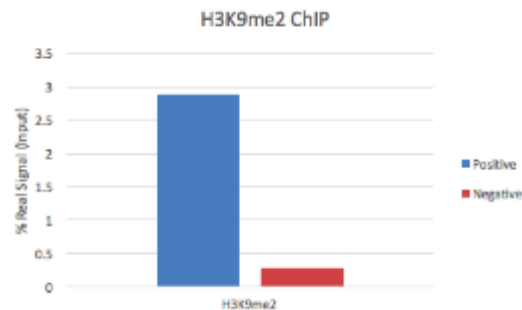
### Applications:

Application	Suggested Dilution	Figure
Chromatin Immunoprecipitation	2µg: 1µg (chromatin: antibody)	1
Western blot	0.25µg/mL - 10µg/mL	2
Immunocytochemistry	0.5µg/mL - 2µg/mL	3

*Please note: Optimal antibody dilutions should be determined by the user. These volumes are stated as guidelines only.*

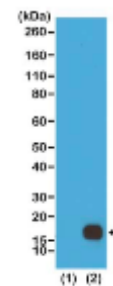
### Fig 1. H3K9me2 ChIP qPCR

Chromatin immunoprecipitation (ChIP) assays were performed using the Chromatrap® standard ChIP spin column sonication kit for qPCR (Cat no. 500071) with 1 µg of chromatin from Hec50 cells and 2 µg of Anti-H3K9me2 antibody. qPCR was used to analyse the enrichment of H3K9me2 onto the positive gene locus in comparison to the negative gene locus.



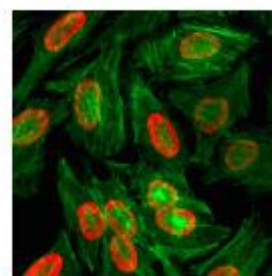
### Fig 2. H3K9me2 Western Blot

Western Blot of recombinant histone H3.3 (1) and acid extracts of HeLa cells (2), using H3K9me2 at 0.5 µg/mL, showed a band of histone H3 dimethylated at Lysine 9 (k9me2) in HeLa cells.



### Fig 2. H3K9me2 Immunocytochemistry

Immunocytochemistry of HeLa cells, using Dimethyl-Histone H3 (Lys 9) (red). Actin filaments have been labelled with fluorescein phalloidin (green).



## Advancements in Epigenetics

\*This product is for research use only. There is a possibility that results may vary between antibody lots.